Commerce

SOUTHERN
# TEXTILE BULLETIN

VOLUME 25 CHARLOTTE, N. C., THURSDAY, FEBRUARY 7, 1924 NUMBER 24

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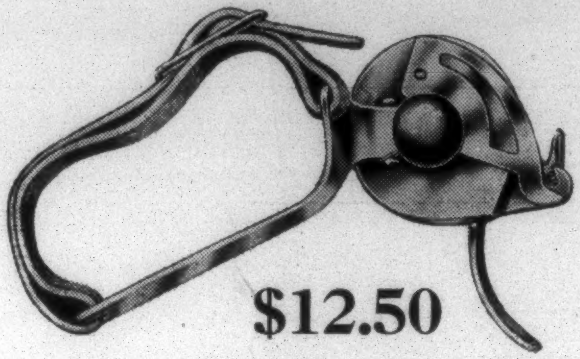

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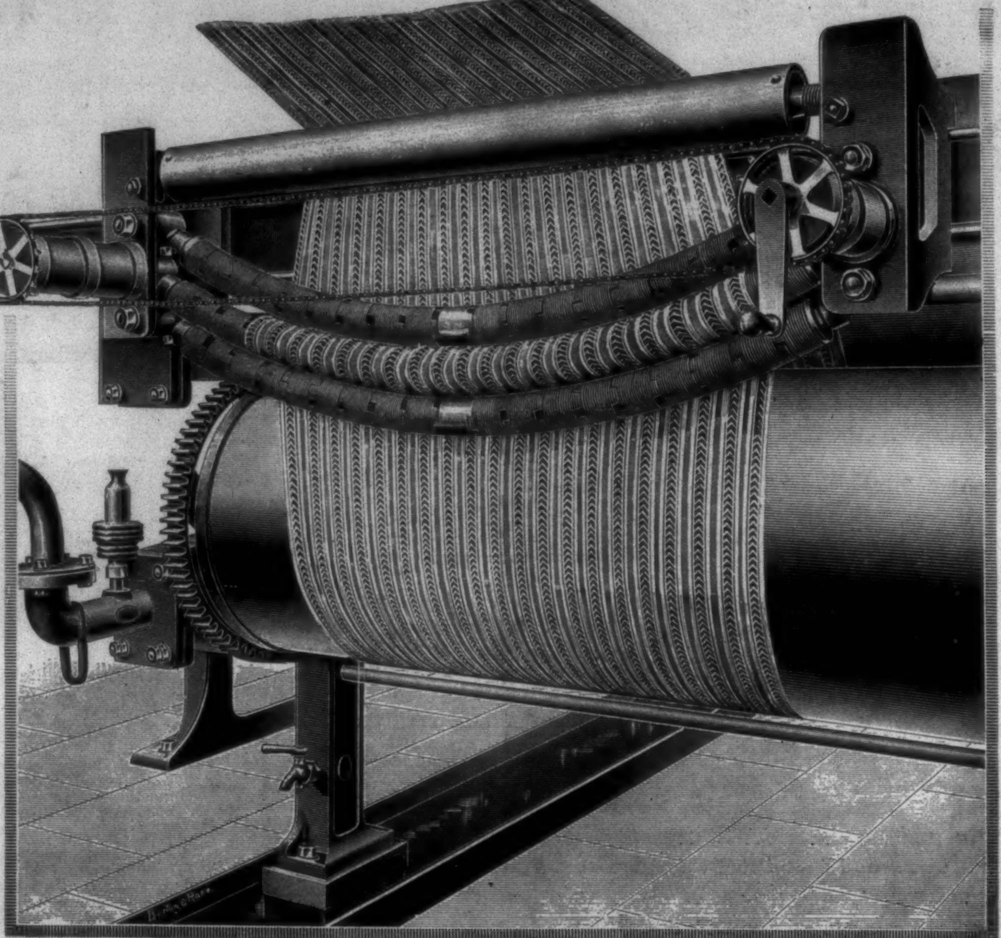

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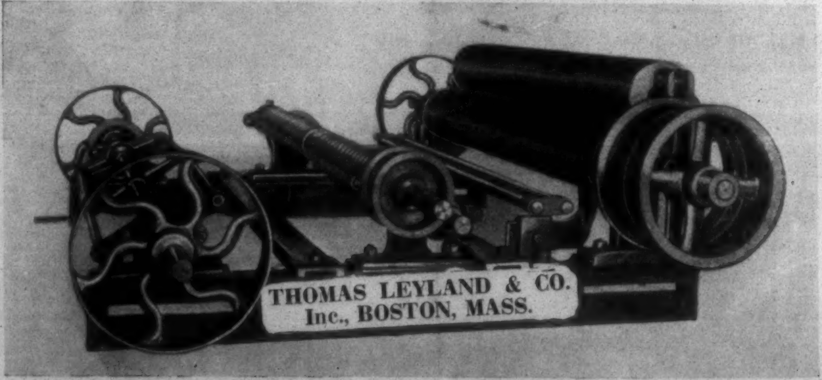

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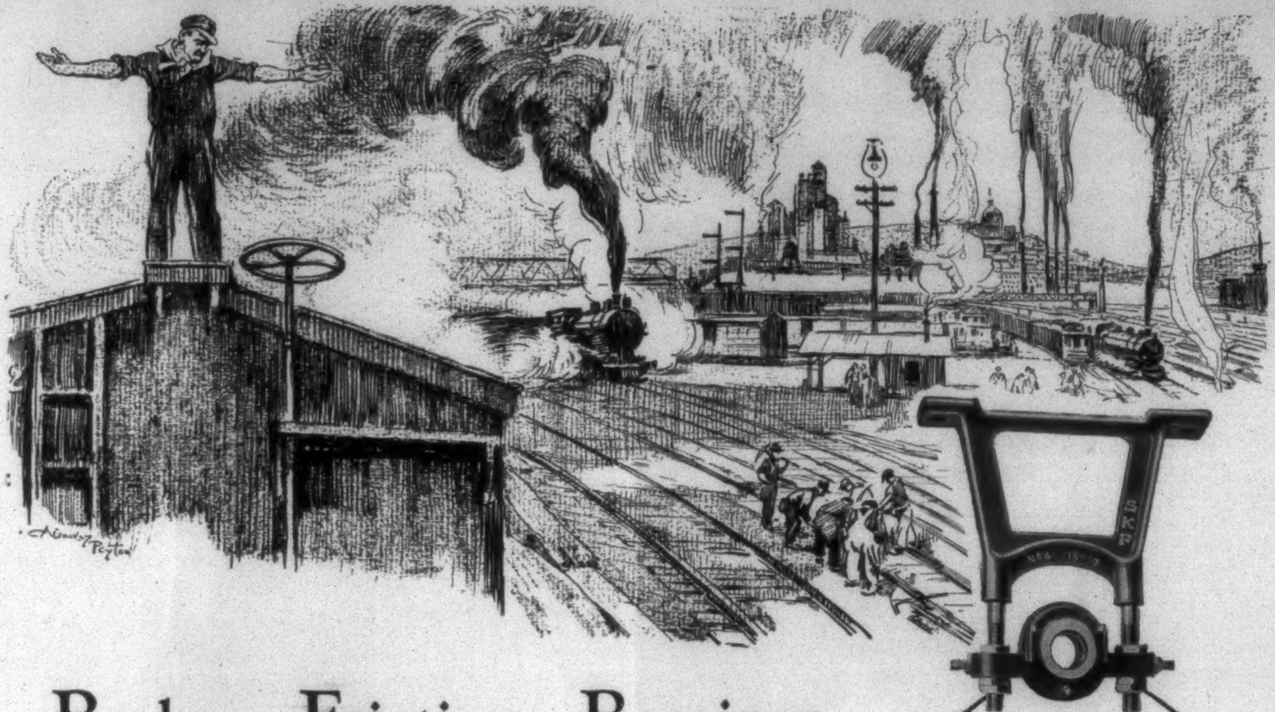

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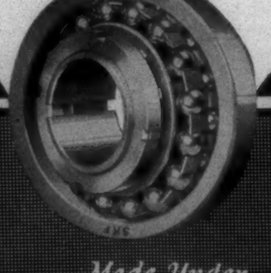

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VOLUME 25 CHARLOTTE, N. C., THURSDAY, FEBRUARY 7, 1924 NUMBER 24

# *South Africa's Chances With Cotton*

THERE is one man who has put South Africa cotton on a clear and scientific footing, without flattering the prospects or blurring the awkward facts. This is Mr. G. F. Keatings, an ex-Indian official, whose services to Indian agriculture have been rewarded with the Companionship of the Order of the Indian Empire. In the light of his experience, and the way in which he has improved cotton-growing in the Bombay and other provinces, and, above all, his enlightened policy for fourteen years as India's director of agriculture, he was lately persuaded to leave his retired leisure here in England and undertake a tour of observation throughout the cotton-growing areas of South Africa. The results as embodied in a carefully considered report are a model of the enlightened and conscientious work which our civil service officials have placed at the service of India's progress for many decades past; and there is ground for genuine regret that the new conditions created by the Indian reforms by the Curtis scheme are reducing this great staff of humane and diligent public servants to a minimum, says J. P. Collins in the Boston Transcript.

Our immediate interest, however, is South Africa and the question whether its present modest output will ever cut any considerable figure in the total production of the world. Mr. Keatinge is under no misgiving or misapprehension on that score. After considering the subject in all its aspects, and especially with an eye to the expectations of the British importer, he comes to the conclusion that South Africa will thoroughly well justify an increasing and somewhat bold expenditure of capital and trouble on well-marked and prudential lines. But the assistance given must be adequate, he says, and given without delay; and the document of sixty pages in which he arrives at these conclusions may rank as the Bible of the South African cotton growers, as Mr. W. M. McKee's treatise on "South African Sheep and Wool" deserves to be regarded as the standard guide for the sheep breeder and the shepherd in the same Land of Promise. Let us see what Mr. Keatinge has to say.

America may claim indirectly to have played the pioneer cause of cotton-growing in South Africa, as she did the French Revolution and so many other interesting movements. For it was her Civil War and the shortage of cotton thus occasioned which prompted the experimental growing of cotton in the Eastern Province of Cape Colony and various sporadic efforts, until twelve years ago the pursuit was taken up in commercial earnest. But it took some years for farmers to descend from the risky higher levels on the "high veld" to a less frosty elevation where the crop could be gathered before the frosts arrive. In only rare cases had this wise course commended itself to the cautious grower. One farmer has planted and gathered cotton continuously for seventeen years, with the exception of two years of war-time when ocean freight was impossible. But this was a rather isolated case, and, descending to statistics, we find local tendencies to exaggerate quantities, acreage, etc. It seems clear, however, that the uplands of Natal are "catching up" with the Transvaal, for they have risen from a proportion of one-sixth five years ago to five-sevenths in 1920. Even now the total export of raw cotton ascertainable for 1922 is only 1,606,627 (value just under $300,000), and these figures, supplied me by the South African Trade Bureau in London, are modesty itself compared with world statistics and requirements.

Yet it is noteworthy that they mark a big advance on those of the previous year, and it is the rise, not the static fact, which counts in the eyes of people who have an eye to the real factors of international trade. Only one thing makes one chary in accepting South African figures, and it is this: there is the inevitable tendency in a young and widely scattered country for different districts (and different races) to nurse their own methods of reckoning, so that a bale in one province may contain anything from 100 to 400 pounds, while in another district one single bale may contain twice as much as its neighbor. A bale of cotton seed, again, may be a bundle of five hundred pounds, or so. But Mr. Keatinge has checked his estimates carefully, and after all, it is his reading of progressive conditions that interests us, not the scaling of any special district or season, or all combined.

Climate, that arbitrary penalty which nature lays on all, is a factor well worth study in South Africa, for it supplies the key to the whole position. The Transvaal, 3,500 feet above sea level, is set down by experience as the limit of height, and 2,500 feet even has its risks, so it may be safely stated that the best average is 2,000 feet or less, as calculated to afford a growing season before October and November bring the rainy season and the advance of frost. This reduces the available areas in Transvaal and Natal, and the chief region for suitability is the large tract of low country below the main escarpment which runs from the Zoutpansberg, on the North, southeast to the Barberton district, and then cuts south through Swaziland and Natal into Zululand. This low country between the Drakensberg and the Lobombo Mountains is at an elevation of less than 2,000 feet above sea level, and in point of temperature is admirably suited for cotton. The foothills of the Drakensberg, up to an elevation of about 3,000 feet, are also well suited for cotton, though there is some risk of early frosts. The other area which comes just within the limits of elevation indicated above is a large and indefinite area in the Rustenburg and Waterberk districts. To the north of the Rustenburg district there is a tract about 3,500 feet above sea level where cotton is now grown on a fairly extensive scale.

The latter region has an annual rainfall of 15.25 inches and the former 25.35 inches, with a higher record still for Zululand. Here again is a department of inquiry where systematic and scientific growing on a standardized scale will demand a much more careful and continuous record of rainfall than has been kept hitherto. For only this can show the real incidence of those droughts which sometimes occur for six weeks at a time; or torrential downpours which sometimes drench the crops with ten inches in a single day. Damage is much more likely from sheer weight of rain like this than any deficiency, with its sequel of aphis and the shedding of bolls. As for hailstorms (usually in November and December, though they have been known as late as March), they are confined to narrow, well-defined belts, so that an individual farm may suffer badly but not a district.

South Africa is notoriously a land of extreme diversity of soil, so that light and heavy, poor and rich soils may often be found in the same field, and it would need a column to hit off the diversities between district and district. The Rustenburg region, which may stand for the rest, shows heavy black soil derived from norite on the east, and on the west rich loams of a diabasic character with interspersions of a sandy, shaly sort. Where light soils give only a couple of pickings, the heavier varieties yield three or four, together with a better ginning percentage. The "black turf" of Rustenburg is very fertile but difficult to handle; it needs an early saturation with heavy rain, and is liable to get waterlogged even then. Soil is the subject that few South African farmers have studied properly, and is one of the departments which will need taking in hand by an expert. Irrigation has been undertaken with Pima cotton and good results have accrued in and around the experimental station at Rustenburg, but other plans on a more ambitious scale in the neighborhood of various rivers are awaiting funds to carry them out, and these are not available or likely to be just yet.

If South African farmers are going to turn from their favorite avocation of stock-breeding, they must cultivate experience carefully with effective tillage and systematic rotation by crops, as also with fertilizers. Heavy storms may waste away a whole surface and its crops a quarter of a mile away, where the soil is light and powdery. On some farms where the lands are undulations it will be necessary to choose land with a considerable slope, and leave a strip of bush untouched along the contour in the middle of a field so as to check the flow of surface water. Deep ploughing to the extent of nine or ten inches often damages a crop by bringing raw subsoil to the surface and depriving the young plants of the available food, and the farmers are advised to increase the depth gradually year by year.

The manual labor element, chiefly of natives under white settlers, is another thing that requires careful study, and as some territories are reserved exclusively for whites or blacks. In the Transvaal the question of location is very indefinite and trouble may be avoided by giving the map condition thorough attention beforehand. There is an intention to increase these native locations, and the legislative conditions since the Native Land Act of

1913 require to be overhauled, especially in districts where the executive is allowing the purchase of land by natives outside the letter of the law. Even where a white farmer buys, and has the right to turn off the natives at sight, he would be foolish to do so, considering that without labor his holdings would be valueless. Again, the land companies hold large blocks of territory, but these are destined to become native areas in the end, and here again the old rule applies that the buyer must be on his guard. It has been suggested that these companies should encourage the native tenants to grow cotton as being more profitable than growing maize. But here, as in Zululand and Swaziland, the native shows himself incorrigibly conservative and unwilling to take risks of being cheated as to price. He grows maize for his own consumption, and as this allows him to run his stock and leave the field work to the women, he is likely to continue the arrangement. Then if he runs into debt or wants a little extra money he can always hire himself out to local farmers or the mines, and return with the surplus to his kraal and life of ease. On the whole, therefore, it may be said that the man who understands the native's ways, or employs a manager with this knowledge, and makes a good impression on them, can generally get whatever labor he may need, so there is no real trouble with cotton on that score, as a rule. It is only where labor needs are concentrated that the difficulty arises, and even there there is reassurance, for the native population is increasing rapidly.

Fortunately South Africa is clear of two chief pests—the pink bollworm and the boll weevil, and though the regulations for excluding them cause some trouble to the farmers, they are accepted and enforced, nor does anyone deny that they are well worth enforcing. But the country has its own pests, three in number—the American bollworm and the spiny and Soudan varieties, together with others of less seriousness and notoriety. Sometimes the damage they inflict is severe, but as a rule the insect plagues of South Africa do only a moderate average amount of damage. Jassids have been very little studied, but are purely local; and heavy rain usually washes away the aphis. Then there are grasshoppers, catworm bugs, and red bug stainers in two varieties, and when an entomologist is retained to specialize in cotton pests alone, the results ought to be reassuring and satisfactory. Growths like fungold, cotton "wilt," and the "red-leaf curl" of India are conspicuously absent, and a tour of the country shows a remarkable level of health among the cotton all round.

The Agricultural Department of South Africa has a tobacco and cotton division, with four officers employed, in the proportion of one for the first and three for the second, and these are few enough to cover such a vast tract of country. Their best experiments are carried on at a station near Rustenburg, where the best results have been obtained with the Bancroft variety, and a series of manurial trials on light soils, with a rotation of maize, tobacco, cotton and green manuring. An application of 200 pounds of acid phosphates per acre costing 3½ dollars per acre, yields a good profit; and although the process of ratooning is discouraged as a result of trials, it works on "black turf" soils, and has been known to increase the yield of seed cotton tenfold, that is to say from 100 pounds to 1,000 pounds per acre. The question of seed is a tangled one, for in too many cases several varieties have been used side by side and got hopelessly mixed, so that you see mixed samples sown, some containing naked seed, seed with a green fuz, and some with a yellow. Quite distinct varieties can be seen growing together, and the hybrid seeds produced by first crosses are splitting vigorously. There has certainly been no pure line breeding under competent botanical supervision, and this is probably the most insistent need of the cotton industry in South Africa at present. All it needs is a trained plant breeder, and the necessary outlay would be a good investment for the country. Staple up to 1¼ inches has been produced, but the price-yield has varied from 300 points on middling Americans, to 300 points off.

This point of yield demands a few illustrative figures, and Mr. Keatinge supplies many of interest, from which one or two may be taken to indicate the whole. On the Rustenburg experimental station during the last seven years the yield of seed cotton has varied from an average of 268 pounds per acre to an average of 1,182 pounds, the average for the whole farm for the whole series of years being 647 pounds per acre. Last season the average yield of sixteen farmers in the Rustenburg district, who keep careful accounts, was about 300 pounds per acre in a very dry season; but a good farmer in the Rustenburg district some years ago in a good season got an average of 1,400 pounds per acre on ten acres, and last year, with only fifteen inches of rain, he got an average of 500 pounds of seed cotton per acre. In the main cotton belt in the low country below the Berg the average yield of cotton should be higher, since the rainfall is better, and yields of 900 pounds of seed cotton per acre are fairly common.

### Prize Competition Yields.

In the competitions for the prizes offered by the British Cotton Growing Association during the years 1920 and 1921 the average yields per acre on the competitors' farms were as follows:

Average yield per acre in the ten-acre competition: (1920) 448 pounds of seed cotton; 1921) 692 pounds of seed cotton.

Average yield per acre in the fifty-acre competion: (1920) 591 pounds of seed cotton; (1921) 512 pounds of seed cotton.

Average of both competitions during the two years, 540 pounds per acre.

The competitors' farms were situated in the various cotton tracts of the Transvaal and Natal.. As an example of good yields I may mention that last year the yield from 450 acres on the Ncasine and Tugela river estates in the Tugela Valley averaged 1,200 pounds per acre, and in the Vryheid district also heavy yields on considerable areas have been obtained.

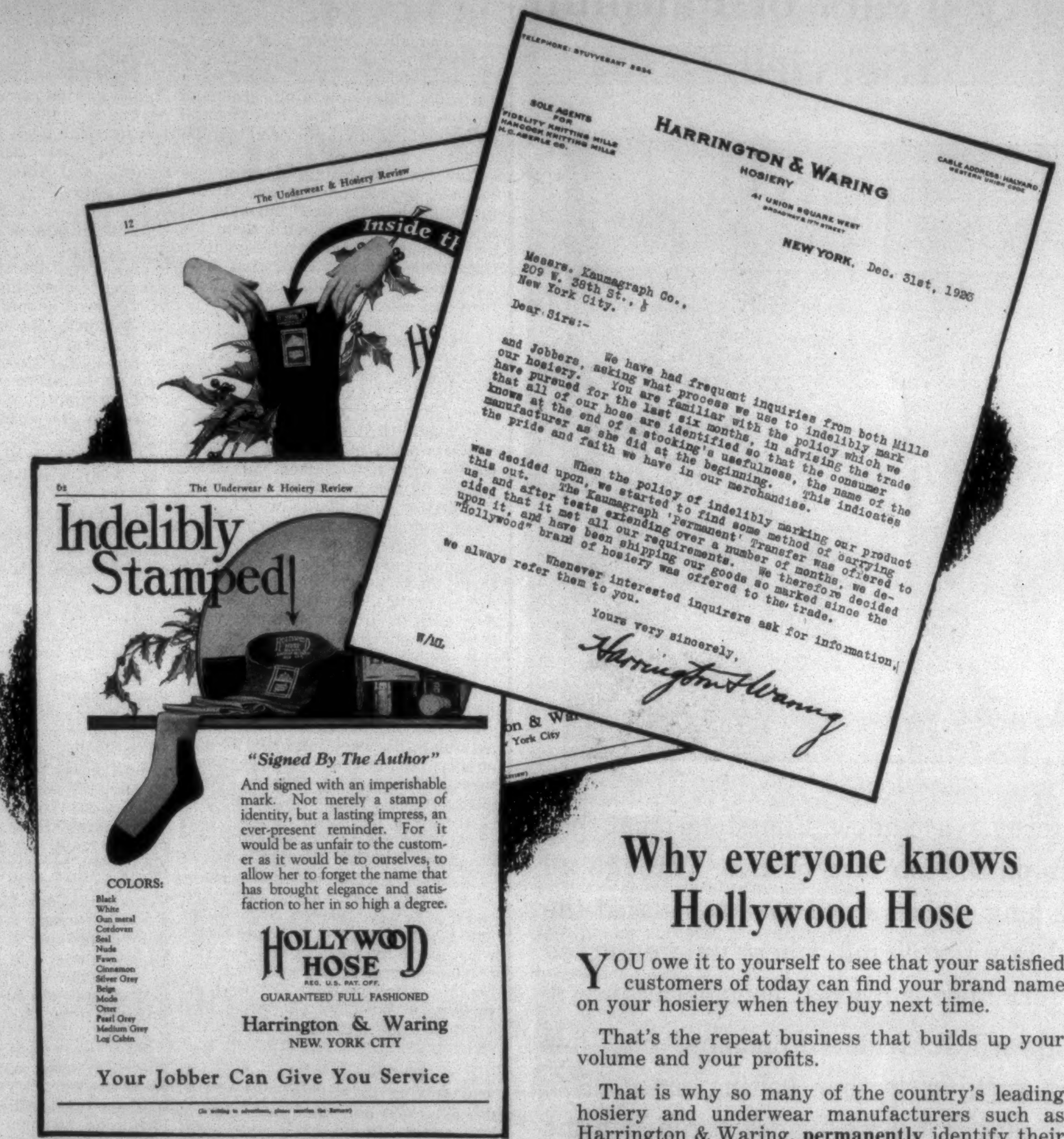
Sea Island cotton has yielded an average of 1,500 pounds to the acre on a four-acre plot at the Mpako experimental station in the Transkei, east of the main cotton belt and the Drakenberg Mountains, but the staple was poor and the same variety has turned out better in other parts. But there is no roller-gin available, and the Transkei is a native tract, where each native family has ten acres of arable land with outside pasturage rights attached. Here, it may be added, the population is pressing heavily on the land, and the local administration would welcome assistance in experimenting for long-stapled cotton, and this excludes the Sea Island variety.

There are other important questions to be considered in South Africa, like handling and marketing, and these are problems that have deterred many farmers from growing cotton, simply for want of a good agency and co-operation. Ginning is bad and scarce, and farmers have been known to send their crop three hundred miles to Pretoria for ginning and thence as lint to Durban, another five hundred miles, with all the inevitable burdens of freight. The railway companies have made concessions, and you can send eighty pounds of lint two hundred miles for a penny, so that the difficulty is not insuperable. Marketing is uncertain, and farmers bitterly complain that often having samples accepted at Liverpool, the premium received for cotton in the bulk has been far below the sample price. They evidently fail to realize that Liverpool cannot afford the same rates for small parcels as it can for big quantities such as come from America, and when they do, the discovery will inevitably stimulate the desire to work on a bigger scale and get the benefits of co-operation. For similar reasons there can be no selling futures in Liverpool until the crop assumes larger proportions and the trade is better organized. What is worse, the farmers must stand out of his money for six months after harvest, and delay in pressing and shipping increases the interval still further. For some reason or other the two chief South African banks are said to decline financing any such deals, and what is required is a substantial corporation to come to the rescue, and work on strictly business lines. It is one of the many illustrations of the way in which big finance in South Africa is wholly on the mineral side, and has a half-hostile bearing towards the agricultural element, a jealousy for which the country has to pay many times over. Besides, cotton cannot compete at present with cattle-growing, and communications are very bad.

The next twenty years, all things considered, may see South Africa producing a quarter of a million bales of cotton, with every prospect of rising to the half million, and possibly a million, if the concentration on limited areas is carried out as it ought to be. But this means also a new experimental station in the Transvaal low country at Komatipoort, near the Portuguest port of Lourenc Marques, with a cotton-breeder, a soil specialist, and an entomologist as the nucleus of a working staff, and a strong commercial corporation for handling, marketing and financing the crop on commercial lines. Though this would only affect one area, the effect on the rest would be considerable, because it would set up a standard and a model for other tracts. As for ginning, a ginnery might be set up at Komatipoort, with a manager available to visit other ginneries as the need arises and his convenience allows. White settlers and native cultivators should be considered as separate propositions, though not necessarily by a separate corporation for each. The present, according to Mr. Keatinge, is an appropriate moment for instituting fresh and enlightened methods on these lines, but as already said, the assistance given ought to be adequate to utilize existing opportunities, and it should be given without delay.

### A South African Cotton Corporation.

It is on lines like these that matters will develop sooner or later, and Sir Henry Dundas, on behalf of the Empire Corporation, has suggested a South African Cotton Corporation for all these purposes just indicated, selected farmers to be financed by undertaking direct production or some other desirable way. It is further suggested to assist the Cotton Institute proposed in connection with the cotton branch of the Agricultural Department in the way of scientific research and the establishment of cotton seed farms; as also by an annual grant for a period of years, and by giving advice and general assistance wherever required. The South African minister for agriculture, Sir Thomas Smartt, and his colleague, Senator Reitz, the South Africa's minister of lands, have been asked to state definitely that such a corporation would be welcomed, that it would be granted such land and water rights as Government can give for erecting the ginnery press described, that it would appoint a nominee of his own to the board, and grant Crown lands such as may be required, for experimental cultivation and seed farms, on terms such as may make cotton-growing reasonably possible. Furthermore, as a levy of a dollar a bale of 500 pounds has been proposed on exports, and the Government reserves the right to forego this in particular cases, it is suggested that these experimental and stimulative measures constitute just such a case. One weak point about the proposal is that the Portuguese authorities at Lourenco Marques have not been particularly friendly of late, chiefly through a difference about exchange, etc., at Mozambique; but General Smuts has been conducting negotiations in London with the Portuguese minister, and it is hoped that these difficulties will be overcome. Otherwise, some other port would be used at a greater distance. For the present it may be said that Sir Thomas Smartt has returned a favorable answer on all points and now that the British premier has encouraged an empire cotton policy, it may go forward in this respect of organized assistance whatever the result of the general election.



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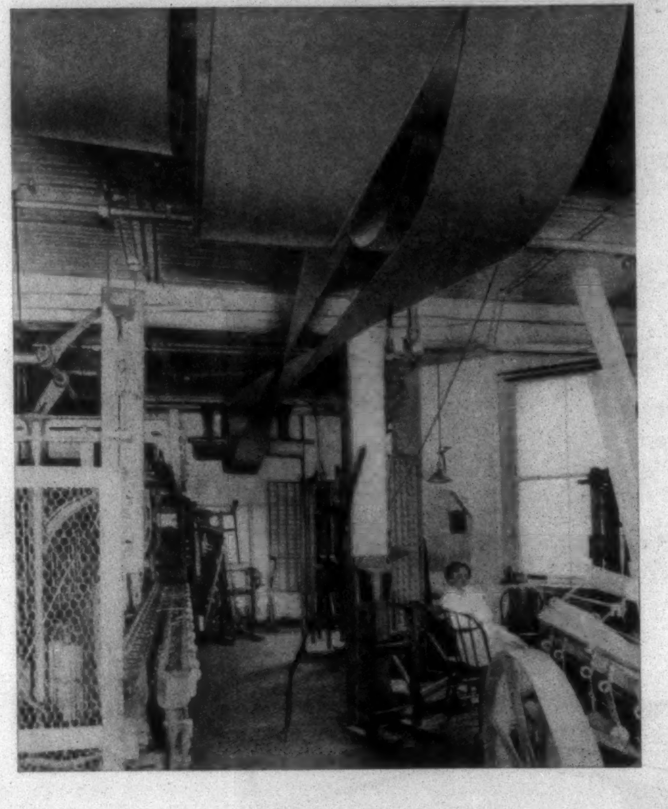

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# *Artificial Silk*

While the first artificial silk was produced about thirty years ago in an effort to stimulate the product of the silk worm, it was more of a curiosity than anything else and lacked many of the fundamental elements essential to commercial success. It was simply gun cotton softened by solvents and spun into threads, coarse, uneven and highly inflammable. Its first introduction into fabric was met with suspicion by the manufacturer and danger to the public—so much so, that laws were passed forbidding its manufacture and sale.

Chemistry was not idle, however, and soon a method was discovered whereby all attendant danger was eliminated. The yarn was made even more adaptable to the textile trade and today through its consistently uniform performance, its popularity has become firmly fixed. It is regarded by many as the most versatile textile yarn in the world. Variations of the original methods and process have been introduced by each newcomer in the field but the resulting yarns are all fairly similar in appearance, even though present-day yarn is produced from wood fibre as well as cotton.

Its phenomenal spread and growth can be visualized from the fact that it is only the matter of a decade since the first small packages of artificial silk were imported to this country by one of our prominent mercantile banking houses. These silky, creamy, white yarns of high lustre were described in the early trade journals as representing the latest activities of chemical experts in France, Belgium and Switzerland. At first they were viewed as a curiosity and were passed around the trade with laughter. Experiments were made by knitters and weavers of ribbons and broad silks but it is frankly admitted that the first efforts were far from successful and artificial silk left much to be desired.

It was lustrous, to be sure, but was lacking in strength, dyed unevenly, was not very uniform in size, and was harsh and brittle.. Today, it is lustrous or soft in tone, according to requirements; its tensile strength is from 10 to 60 per cent greater than the best of warp cotton; it dyes evenly and will absorb any shade of the rainbow; it is very uniform in size, is soft and warm to the touch. It comes in skeins of many thousands of yards, and can be wound in any form or used in the looms for either warp or filling; is durable and lasting, apparently unaffected by time, and in its bleached state, remains pure and white.

The knitting trades accepted artificial silk yarns rapidly. Hosiery men first used it in combination with cotton as a plate; then underwear and knitted cloth manufacturers entered the field. Mills which acted as pioneers in the early days soon found that they were giving their customers something entirely new and that it was not substitution but embellishment that resulted from its use. In looking over figures of consumption, year by year in so far as they are available, it is evident that the knitting trade, in which is included knitted piece goods, sweaters, neckwear, underwear, and the like, has thus far been the largest single class of user. The hosiery trade follows and then the weaver of broad goods.

Artificial silk is so comparatively new a textile and its growth has been so rapid that manufacturers of yarn have been unable to keep pace in the development of new uses for the product. Manufacturers of cotton linings for dresses, suits and overcoats, for example, are just beginning to utilize artificial silk in decided quantities. The results obtained in the form of satins with cotton backs, and also in taffetas and other like materials give excellent wear, are beautifully lustrous and are reasonable in price. Sport satin, produced from mercerized cotton and artificial silk, was a remarkable material and one which gained popular favor over night. It is coming back, I hear, chiefly in those materials produced from the finest counts of both cotton and artificial silk.

The ribbon trade now uses great quantities of artificial silk and is developing its use in connection with mercerized cotton for moires, plain staples and novelties. Labels for all kinds of textiles give excellent results when set up with artificial silk. Laces, curtains, braids, upholstery fabrics, millinery cloths, necktie materials, glove cloth, metals, shoe coverings, all represent classes of textiles in which cotton yarns have long stood as important manufacturing factors. Now the field is proving that it can be advanced further by the introduction of artificial silk yarns which embellish and add to the value of the finished product.

Most silk manufacturers in the United States today are making some use of artificial silk yarn. An instance of another new field just beginning to open up for artificial silk is disclosed by braiders and covered wire manufacturers. Its lustrous sheen and clear, deep coloring make it a perfect covering for lamp cords, telephone wires and similar materials. As an insulator and covering for fine magnet wires it has no superior when properly treated and applied. Its development in the shirting trade is familiar.

There seems to be a general impression that artificial silk will not stand up when wet or during a washing process. It is true that our product loses tensile strength while wet, but the same strength immediately returns when dry. If properly washed, with no more care than should be given to any delicate textile or fabric, it will wear and give excellent satisfaction. Artificial silk yarns of different manufactures have different degrees of strength, some yarns being far stronger when both dry and wet than others.

HOUGHTON

# PENETRATION

THERE is much difference between the power possessed by various liquids to penetrate solids.

As an illustration; accurately measure a drop of one liquid and a drop of another. Place each drop upon a piece of paper of the same quality, and see to it that the paper lies perfectly level. It is thoroughly possible for one of these liquids to spread itself over an area several times larger than that over which the other will spread itself. While the test thus described is one of common practice it is not necessarily a certain test for penetration, for it may be possible that the paper used contains more or less of a filler or gloss and that property which permits a liquid to spread itself over the largest non-poreous area is not necessarily the property which permits it to penetrate interiors, although there is some relation between the properties.

Let us take the process of decolorization of oils by filteration. In this process the oil is passed through columns of filtering material, usually Fuller's Earth or bone-black. That oil which penetrates best filters the easiest and with the least cost. But such an oil would cut a sorry figure if used in a textile softener, because it also parts very readily with its coloring matter which is fine carbon pigment in mineral oil and blood pigment in animal oils.

An easy filtering oil possesses the power to penetrate in itself, but it does not possess the power to carry anything with it in penetrating action.

The tendency of the yarn is to filter or strain, from the liquids mixed with the size, the solid ingredients in the size and leave them deposited on the surface. This is what causes all of the trouble in the conditioning process. It causes the warp to become brittle or pipy and break on the beam, and is the cause of not carrying the size through to the cloth.

The imparting to an oil the property of penetration is not a problem which is identical to the manufacture of a conditioner, for cotton goods, but enters more or less into all of the industries.

All case-hardened metal must be penetrated by carbon gases; wool must be penetrated by an oil in preparing it for the cards; leather must be penetrated by an oil in the currying process; silk must be penetrated by an oil or soap in the process of conditioning. But each of these processes of penetration carry with them some peculiar requirement identical to itself and to no other.

For instance with the preparation of wool, the oil must be a ready solvent for the natural greases of the wool, a corrector of electricity and scour readily. With leather the oil must penetrate into every crevice of the hide, lubricating the fibres and carrying with it a certain amount of solid matter such as stearine. Products which are in themselves oils at certain temperatures and which are readily soluable in oil in certain proportions.

But when it comes to conditioning cotton warps, the conditioner must carry through to the interior of the yarn, in a uniform manner, the starch, etc., which compose the size. It must not release the size by a filteration process and permit it to remain on the surface, neither should it release the size and permit it to ooze to the surface of the warp when the warp is under the tensile strength to which it is subjected on the loom.

Thus it may be comprehended that in a Warp Conditioner property of penetration plus the property of dissolving the size are desirable characteristics. And we might appropriately add, plus the property of staying put.

Thus it will be appreciated that the manufacture of oleagenous products for one industry is more or less related to the manufacture of those products for all industries and HOUGHTON'S WARP CONDITIONER is the final result of many years' experience in the manufacture of oils possessing soluable and penetrating proportions.

## E. F. HOUGHTON & COMPANY

**Works: Philadelphia—Chicago**

ATLANTA, GA.
1001 Healy Bldg.
Phone: Walnut 2067

GREENSBORO, N. C.
P. O. Box 81
Phone: 1990

GREENVILLE, S. C.
511 Masonc Temple
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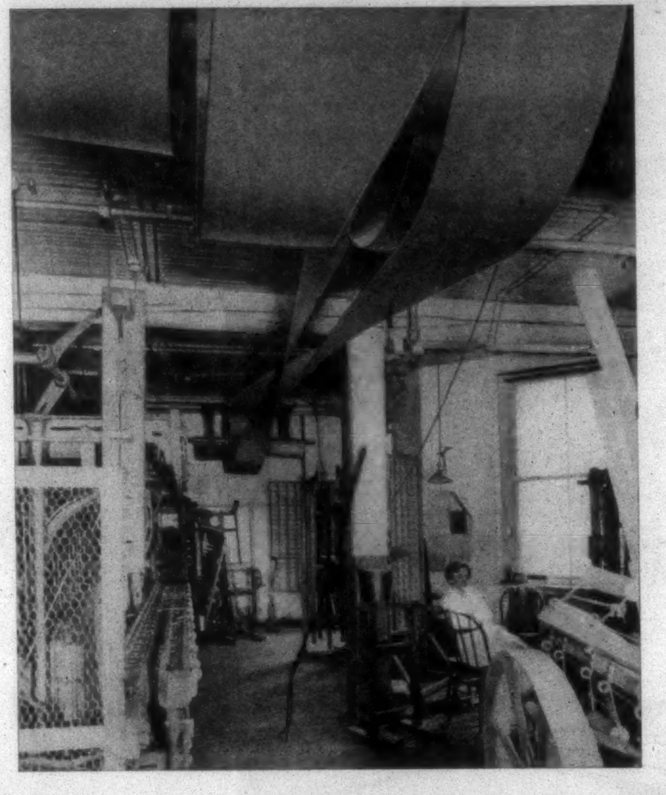
ST. LOUIS, MO.
418 N. 3rd St.
Phone: Olive 3559

Allentown, Pa., Baltimore, Md., Boston, Mass., Buffalo, N. Y. Cincinnati, O., Cleveland, O., Davenport, Ia., Denver, Col., Detroit, Mich., Harrisburg, Pa., Hartford, Conn., Indianapolis, Ind., Kalamazoo, Mich., Los Angeles, Cal., Milwaukee, Wis., Newark, N. J., Pittsburgh, Pa., Portland, Me., Portland, Ore., San Francisco, Cal., Seattle, Wash., Syracuse, N. Y., England, Ireland, Scotland, France, New Zealand, Australia, Norway, Spain, Belgium, Japan.

*Oils and Leathers for the Textile Industry*

Forty Years of Faithful Service



Here is a Ladew Flintstone that has been on the job forty years. Through all this long life of service it has carried the load in a textile mill where uninterrupted performance is a great consideration.

Edward R. Ladew Company, Inc., has been making leather belting since 1835, and today the name "Ladew" stands in the very front rank among the successful belting manufacturers of the world. This position, won by adherence to high business ideals which have placed the user's satisfaction first at all times, is being maintained in every department of the Ladew organization.

Edward R. Ladew Co.
INCORPORATED
29 Murray Street, New York

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*Oils and Leathers for the Textile Industry*

# *Visiting the Textile Machinery Shops*

(Continued from last week)

BY DAVID CLARK

### Whitinsville Spinning Ring Co.

THE Whitinsville Spinning Ring Co., although it has no connection whatever with the Whitin Machine Works, is located adjoining them. Mr. Carpenter, who had shown me over the Whitin Machine Works, very kindly accompanied me to the office of the Whitinsville Spinning Ring Company, where I found the vice-president and assistant treasurer, Mr. S. F. Brown, who is well known in the South, and also Mr. Wesley, the bookkeeper.

In company with Mr. Brown, I paid a visit to the president, Mr. Arthur Whitin.

It had been some years since I had seen Mr. Whitin and I enjoyed a short talk with him. He originated the Whitinsville Spinning Ring Company and has conducted it as a successful business through many years. He has also been actively engaged in cotton manufacturing.

Leaving Mr. Whitin's office, Mr. Brown conducted me through their busy shop and I learned that they manufacture rings on a different system from other people.

Whereas, some drop forge their rings and others punch a hole in a bar and roll them out, the Whitinsville Spinning Ring Company buy special steel in bars. The bars they were working when I went in were about ⅜ inch thick by 1 inch wide. A machine cut these off in lengths according to the size of ring to be made. The short lengths were heated, bent ring shape and so expectly welded that it is impossible, after the ring is made, to find the welded place. The Whitinsville Spinning Ring Company have always made their rings on that system, claiming that it adds to the efficiency of the ring to have the stock in the ring always worked in the same direction as the travel of the traveler.

After being welded and rolled to size the rings are turned to size in automatic lathes. Sometimes they turn two rings and then cut them apart.

The Whitinsville Spinning Ring Company can turn out a maximum of 35,000 rings per week, and as almost every machine in their plant was busy, I do not think they were running much below capacity.

After the rings are turned they are carried to the case hardening room, where they are packed with bone and chemicals into small boxes covered with iron filings and kept for a certain time in automatically controlled case hardening ovens.

After being hardened they are polished by hand. They are placed in high speed chucks and boys with soft wooden sticks, covered with emery dust, polish one side and then the other.

After that a very careful and minute inspection is made of every ring.

The Whitinsville Spinning Ring Company also make ring holders but it is a simple process compared to the manufacture of rings.

While in the plant I met Charles Hardy, the superintendent, and William Gould, the assistant superintendent. William Dutemple, their Southern salesman, was in the South.

### Fornier & Lemoine.

As Mr. Brown offered to drive me to the station and I had plenty of time, I asked him to take me by the plant of Fornier & Lemoine, who recently started the manufacture of a patented clutch spindle. I met them during the Textile Show last fall and was impressed with their clutch.

I found both of them at their shop busy changing over spindles for one of the largest and most successful of the New England mills. They have a small but complete shop, and both being spindle makers of long experience, appear to be turning out first-class work.

They either furnish entirely new clutch spindles or fit their clutch to old spindles after repointing and straightening them.

They claim many advantages for their clutch and from the orders they have on hand they have convinced some of the New England mills of its value.

Mr. Brown drove me from Fornier & Lemoine to the Whitins station, and after changing cars at Blackstone, I reached Boston about 6 o'clock.

### Vermont Spool & Bobbin Co.

Leaving Boston Sunday night at 8 o'clock on a Central of Vermont sleeping car, I awoke next morning with my train traveling along the banks of beautiful Lake Champlain and at 8:30 o'clock reach Burlington, Vermont.

There was some snow on the ground but it was small compared to the amount usually incident to a Vermont January.

A short drive from the station brought me to the factory of the Vermont Spool & Bobbin Co., where I found C. D. Ordway and H. L. Winter in the office.

The Vermont Spool & Bobbin Co. is not a corporation but is owned by a six-man partnership, the members being C. D. Orday, A. A. Tiffany, H. L. Winter, H. O. Taft, W. H. Wilson and G. A. Ordway.

C. D. Ordway acts very largely in an advisory capacity, A. A. Tiffany and H. L. Winter look after the business end, including sales, while H. O. Taft, W. H. Wilson and G. A. Ordway manage the manufacturing end.

While most of my time was spent with H. L. Winter, I met H. O. Taft, who is affectionately called "Dad" Taft by everyone, and he turned me over to W. H. Wilson, who showed me over the plant and explained the processes. Mr. Wilson was at Pinehurst last season and is somewhat acquainted with the South.

The product in which the Vermont Spool & Bobbin Co. take most pride is jack spools for the woolen mills. Jack spools are often a yard long and have small heads. It seems that the Vermont Spool & Bobbin Co. have a patent lock nut by means of which a broken head can be taken off and a new one put on.

They are large manufacturers of warp spools for cotton mills and it was interesting to note their system of gluing together three layers of wood for the heads, the middle layer being placed at right angles to the other layers.

Everywhere was special machinery for insuring accuracy in the spools or bobbins produced and efficiency of operation was evident.

It is an open shop with practically no union men employed and the employees appeared to be interested in their work and striving for high-class production.

The finished spools of the Vermont Spool & Bobbin Co. appeared to be of a very high quality.

They use hard woods for heads but for barrels they had a surprisingly light and tough wood known as bass wood. It grows in Vermont and Canada.

In spite of the large volume of spools and bobbins they were putting through the machines, there was not a bit of trash or dirt anywhere and I marveled at their ability to keep the factory so very clean.

Mr. Winter wanted to take me to the Burlington Rotary Club meeting but I was obliged to leave at noon for Springfield, Mass., where I spent the night at Hotel Worthy.

### Foster Machine Co.

Next morning I went by train from Springfield to Westfield and reached the plant of the Foster Machine Company about 9 o'clock.

I found my friend, E. T. Fowler, the treasurer, in the office, and he introduced me to John McKean, who is both president of the company and superintendent of the shops.

I regretted to find that T. E. Conner, the vice-president and sales manager, was absent.

Mr. Fowler formerly made frequent trips to the South and is still a popular attendant at conventions.

Mr. McKean showed me over the shops and explained the machines and processes. I found both their plant and output to be much larger than I had believed.

Starting with a large foundry fitted with machine drawn moulds, the work passes through lathes, drill presses and cutters, most of which are especially designed for the purpose.

As those experienced with Foster winders know the winding is produced by a grooved cam, and it was very interesting to see an automatic machine cut the cams so that every one was exactly alike.

I inspected with much interest their case hardening room and their experimental room and was surprised to see the number of engineers and draftsmen that were required to handle the problems incident to special machines desired by customers.

I noted two features that have become a part of each of these sketches. They operate an open shop and every section of their plant is kept exceedingly clean.

They sent me to the depot in the office automobile and I caught the 10:48 a. m. train for Framington, Mass.

I arrived at Framington at 1:50 p. m., and had to wait for half an hour for a trolley to Hopedale.

### Draper Corporation.

Reaching the Draper Corporation about 3 o'clock, I met Mr. W. H. Chase, the man who has for the past year been preparing the excellent advertising copy of the Draper Corporation. Mr. Chase believes that advertising to be effective should be carefully prepared and those who follow the Draper advertising can but be impressed with his work.

Mr. Chase sent for Warren Dutcher, a son of the president of the company, and he showed me the portion of the shops that I had time to visit.

I would not be proper to omit a mention of the office building, which is one of the finest and best arranged I have ever seen.

The clerks' desks are in a large open room, probably 100x300 feet, with the ceiling about 50 feet high. On the front side are the offices of the executives.

We passed hurriedly through several large rooms filled with drill presses, lathes and special machines. Mr. Dutcher explained that in order to insure accuracy, most of the work was done in jigs.

In order to explain he stopped where they were working on the side of filling batteries.

As the piece is lifted to a drill press it drops into a jig which holds it steady and insures that a certain hole is drilled in exactly the correct position and place.

The piece is then lifted from that drill press to another and dropped into a jig.

There are twenty operations on the side of a filling battery and they are done in fifteen jigs. As the battery sides pass, one after the other, through these jigs, all are drilled and planed exactly alike.

I spent quite a while in the bobbin plant watching them manufacture Draper quills and I was much impressed, for never before had seen such a complete system. Throughout every process they applied the principles of their filling battery.

The blanks come down a slide and are placed in a battery similar to a filling battery. As they pass over they are sawed the right length and thrown out.

They are then fed into another battery and as it revolves they are bored three times and then thrown out.

This system goes all through, even to the packing, where the finished quills are placed in a large battey with a counter attached and in that way counted as they drop into the shipping box.

At every step there are girls who inspect and test the quills to insure quality and accuracy.

The varnishing and painting of the quills and the putting on of the steel rings were very interesting processes.

Passing to the shuttle department, Mr. Charles Wheeler, superintendent of that department, showed me how Draper shuttles are made.

I never knew before how many times a shuttle block has to be worked on in order to make a good shuttle.

They pass from jig to jig, each time a small cut being made so that at the end the self-threading eye will exactly fit. I also watched them make the eyes and insert them.

I doubt if anybody could devise a more accurate and efficient manufacturing system than I saw in the shuttle shop of the Draper Corporation.

Passing to a lower floor, I watched them erect looms. One set of workmen put up the sides and arches on a large number of looms and then leave. Another gang puts on the lay and some other parts, while still another gang puts on the batteries.

Under their plan every step in the building of the loom is handled by men especially trained for that particular work, which is undoubtedly better than allowing one set of men to do the entire erecting.

After spending a short time in the exhibit room looking at their various types of looms, I left on a 5 o'clock car, which put me in Framington in time to catch the 6:12 p. m. train for Boston.

### Emmons Loom Harness Co.

Leaving Boston for Lawrence, Mass., on the 8:30 train Thursday morning, I happened to find Jimmie Strang, of the Saco-Lowell Shops, in the next seat and I enjoyed talking to him all the way to Lawrence.

I have known Jimmie for a long time, our acquaintance dating back many years before he left the Metallic Drawing Roll Company, for whom he made regular trips to the South.

Arriving at Lawrence at 9:15 a. m., I drove to the Emmons Loom Harness Company, where I found Arthur L. Jenkins, the assistant treasurer and manager, in the office, but failed to meet the president and treasurer, A. B. Emmons, who was out of the city.

Arthur Jenkins is pleasantly remembered by mill men as having been with the Emmons Loom Harness Company at the Southern Textile Expositions. He began work with his present firm 36 years ago as office boy.

George Bahan, who now represents them in the South, started to work for them about twenty years ago and he was about as big then as he is now.

The Emmons Loom Harness Company was established in 1866 by T. A. Emmons and the work was afterwards carried on and enlarged by his two sons, one of whom died last fall.

A. B. Emmons, who is now president, has had one of the most active minds in the loom harness business and was the originator of many valuable ideas. He was the first to make a cemented loop in place of the old style double knot.

The Emmons Loom Harness Company are now the largest manufacturers of their kind in this country and I can well believe it, after being shown over their plant by Arthur Jenkins.

Starting in the basement, he showed me their method of handling the wood used for the harness bars. It is a beautiful quality of white pine, very light and free from knots.

On the next floor there are dozens of imported machines making twine harness. To tubes of combed Sea Island ply yarns are on each machine and in a very ingenious manner knot tiers and fingers build the harness with a fixed number of twine per inch and tie the eyes in same.

One machine was building harness with "mail" eyes, which are metal eyes. A harness of that kind has the wearing quality of metal or wire harness and the elasticity of twine harness.

Some machines make plain mail eyes, while others make pinched mail eyes under a patent of the Emmons Loom Harness Company.

When the machines complete a harness it is pure white, but it is laid on a machine that carries it forward so that two rollers pass along the eyes and paint a streak of heavy red varnish down the middle.

After the red streak has dried the harness are laid on other machines and pass between brushes that put the shellac on the twine. That process is repeated a number of times, depending upon the size of the twine used.

There are men who place the harness on racks before a light and see that the eyes are all in line, girls who open the harness eyes with a needle and other girls that carefully inspect each harness.

It was the first time I had ever seen twine harness made and I was surprised with the great amount of labor and care that had to be used in its manufacture.

Passing to the loom reed department, I saw the machines for handling the wire and was told that before being ready for the reed the wire was processed forty times.

The manufacture of the reed is not so very complicated. A machine pushes the wire forward and cuts it off while two bobbins of twine soaked in pitch are wound between the end of the wire and hold the dents in place. As the pitch must be soft when the twine is wound on, two burners keep the twine hot. Experts inspect every reed, dent by dent, and the reeds when completed certainly have a high-class appearance,

Leaving the Emmons Loom Harness Company about 10:30 o'clock, I drove to the David Brown Company, on the other side of the town.

### David Brown Co.

At the David Brown Company I found the treasurer, George Gibson Brown, who is pleasantly known in the South from his visits there, and his brother, David M. Brown, who has recently given up a very lucrative business as architect, in order

(Continued on Page 30)

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# *How to Obtain Loom Particulars From a Small Cloth Sample*

(By Georgia Weaver)

QUITE frequently in cotton mills we are called upon to duplicate samples of cloth for a customer. In such an instance, maybe, we must make our decision immediately as to whether we can duplicate the sample, practically, with our types of looms, spinning frames, etc. To do so, it is necessary to have in mind a few simple and practical rules.

When the quality of the material to be analyzed, is determined; and when the structures of the yarn has been found; after the order of interlacing and number of ends and picks per inch has been determined, the following operations must be successfully carried out:

1. Cut the pattern a suitable size.
2. Obtain as great a length as convenient of each of the yarns; weigh and calculate the number of each yarn.
3. Weigh a sample and calculate the weight pcr yard.

After having solved successfully the warp and filling way of the fabric and marked the direction of each, a small sample one inch square, should be cut. As the sides are one inch each way, the cloth so cut will contain an inch of warp ends and an inch of filling threads, which will facilitate the counting of the number of threads and picks per inch, especially is this necessary in the case of fine structure cloths.

A useful method of arriving at the weight per yard of the cloth submitted for analysis, is to weigh one square inch, and from this to ascertain the weight by direct proportion of one yard of cloth the requide width.

Example—

1. By careful weighing one square inch of cloth=5 grains.

2. $5\times36=180$ square inches of cloth 56 inches wide.

3. As $1 : 180 :: 5 : X=900$ grains or 20.57 ounces per yard (36x36 in.)

In other words:

$$1 : 5\times36 :: 5 \text{ grains} : \frac{7000 \text{ grains (per lb.)}}{X \times 16 \text{ (oz. per lb.)}}$$

In order to test the accuracy of this calculation it might be well to weigh the warp and filling separate and calculate the cloth weight from that.

The counts of yarn in any given cloth, as already mentioned, may readily be obtained, that is, at least to the tenth part of a grain, and preferably to the hundredth part of a grain. From the result, allowances must be made according to loss in weight and shrinkage before the counts of yarn in the loom can be obtained. If one yard of the yarn weighs 5-6 grains, from this the number of yarn can easily be obtained:

1 yard yarn=5-6 grains.
840 yards= 5-6 X 840 grains=700 grains.

$$\frac{700 \text{ grs. (weight sample)}}{7000 \text{ (grains in lb.)}} = 10\text{'s yarn}$$

The number of threads and picks per inch vary from being in the loom to becoming a finished cloth, according to the shrinkage of the warp and filling. As the loom width of the clothing being tested is revealed by the filling being drawn perfectly straight, by direct proportion the loom width for any given finished width can readily be obtained.

Example: The filling from a sample cut 4x4 inches stretches to 4⅝ inches.

Find the loom or reed width which must be employed to result in 56 in. wide of finished cloth.
as 4 in. : 4⅝ in. : : 56 in. : X =64¾ in loom.

Experience will prove that the best result and the most convenient method of working will be obtained by considering the threads per inch and width in conjunction.

Having found the ends per inch, the question occurs—what reed shall be used and what number ends per dent will prove most efficient? Experience can only decide this, since, although a coarse reed might be selected which would weave the piece, still a much better result will usually be obtained by the use of a fine reed, for, within reason, the finer the reed the better. This is particularly so in the case of cotton warps, but designers are warned against applying experience gained with cotton warps to wool warps, a large reduction owing to the increased bulk and nature of the threads, and the finish imparted being usually necessary.

The length of the warp is a most important matter, and one to which, so far, little attention has been directed. In its simplest form the question may be put as follows:

Example: A warp 100 yards long is put in the loom. What length of finished cloth will be obtained.

There are two matters here involved: first, what allowance is necessary for twisting in or tying in. Secondly, what will the warp take-up during weaving?

The first matter will be influenced by the tying-in hand or starter of the loom, and can only be estimated, but an allowance of 1½ yards per warp is considered ample under ordinary circumstances. The second matter is one of much importance, since it affects not only the calculations which are being considered, but also calculations relating to allowances for backing and figuring warps. As already mentioned, the take-up of warp during weaving is dependent upon the structure of the cloth which involves type of material, thickness of yarns, number of threads and picks per inch, and the

(Continued on Page 29)

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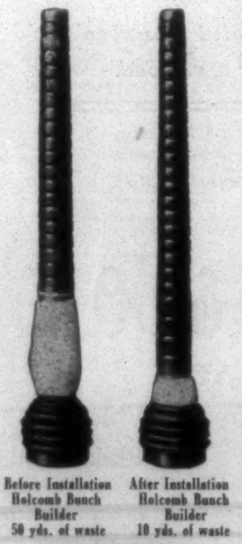

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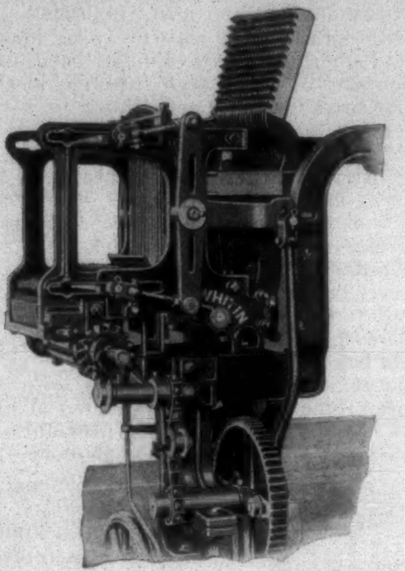

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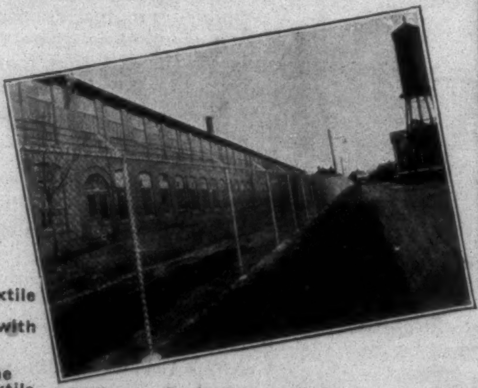

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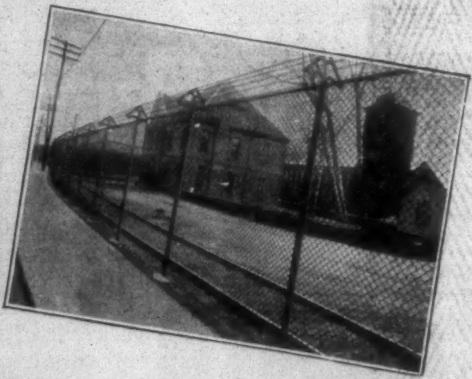

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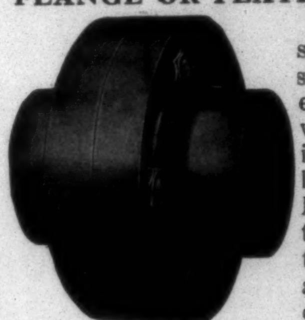

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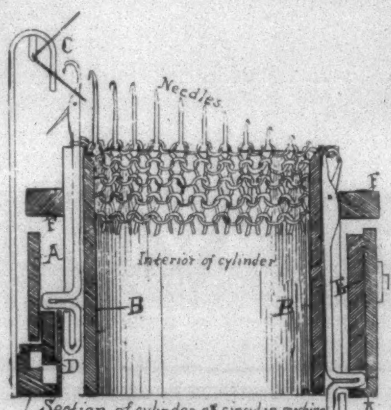
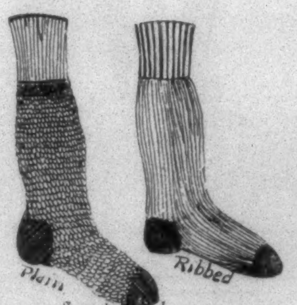
# Knit Goods

### Circular Automatic Knitting Machines.

THE circular automatic knitting machines of the present time possess a number of improved features over the machines of this type which were first used for the manufacture of seamless hosiery. It will be remembered by the veterans of the knitting industry that there was considerable agitation in the profession when the so-called Shaw automatic knitting machines were first started manufacturing seamless goods about forty years ago. The writer was employed in the Middlesex Mills of Lowell, Mass., at that time as a bobbin boy in the spinning department and remembers the interest taken in some samples of seamless hose which had just been made on the Shaw machines and were being passed around among our overseers for examination. Machines of a similar type were soon following, in most of which a cam movement was used for the shaping of the heels and toes by bringing all needles to an elevated position. Then the needles which were required to shape the different parts of the stocking in the machine were brought down by the action of an ingeniously devised expanding and contracting fan mechanism which acted on the heads of the needles. The entire sock could be made seamless except the linking of the toe and this part was closed by the mending girls in such way that the union could not be readily detected unless the splicing yarn happened to be off-color or the stitches drawn too tight. After pressing and finishing the socks they could be put on the market as of the seamless variety.



Section of cylinder of circular machine
Fig 1



Seamless hose
Fig 2

Practically the same procedure prevails now, except that there have been improvements made in the machines and processes of finishing.

The recent models of machines knit and cast off the various kinds of seamless hose with garter top, welt, reinforced heels, double soles, spliced toes and other additions which were not considered possible some years ago. And this is done at a greatly increased speed as compared with the speed of the first circular automatic knitting machines. Four-inch cylinder machines with 260 needles are now operated at a speed of from 280 to 320 revolutions per minute with satisfactory results.

A sectional view of the needle cylinder and its operating parts is shown in Figure 1. The needle cylinder is represented as cut in half through the center, the edges of which are marked B. B. The cam cylinder is indicated by A. A. A band F which circles the cylinder holds the needles in proper position during the knitting operations. Two clearing cams are used, one of which is the knitting cam E, and the other the clearing cam proper marked D, which is operated by the block G. The needles are supplied with yarn from the yarn guide C. In this type of machine the needle cylinder remains stationary while the movement is given to the needles by the rotating motion of the cams. In the revolving cylinder machines the needle cylinder is the part which is revolved. Both machines are employed in the manufacture of seamless hose. Most of them are provided with the latch needles, although bearded or spring needles are seen on some. There are some dealers in knit goods who specify that their order must be composed of fabric knit with the latch needle or the spring needle. But as a rule the commission houses take either the product of the latch or spring needle machines without question as to which design of needle has been used.

Seamless ribbed hosiery used to be made by a hand method of changing from the plain stitch to the rib stitch and vice versa. The process was slow and, although not complicated, the knitters often made errors which reduced the value of the goods for the damaged articles had to be sold as seconds. The invention of the superimposed needle cylinder machine in which double headed needles were used, as described in a previous installment, enabled the manufacturers to make medium and coarse ribbed hose automatically. A drawing of a plain knit men's hose is shown with a ribbed hose in Figure 2. Owing to the method of needle control in these machines the average speed is less than on the plain machines, although one operator can attend to five or six of the machines.

In one type of French circular machine, the stand does not rest on the floor like most American machines, nor does it rest on a platform. It is suspended from the timbers of the floor above the machine. As the needle cylinder and the drawing off rolls revolve the fabric is drawn from the horizontal needles in a descending direction and wound on a take-up beam. The stitches are formed by a system of loop-making sinkers fixed in a sinker wheel and are completed by a method of knocking over sinkers which are set vertically between the needles.

### The Interlock System of Knitting.

There has been a demand for knit fabric gloves in recent years. Formerly knit gloves were in vogue principally for cold weather use. Heavy mittens were needed by the lumbermen and light mittens for the school children. The cold weather sports, such as skating and skiing, created a constant demand for certain kinds of warm knit gloves.

The more modern outdoor pastimes, such as automobiling, camping, hiking, golfing and pogoing, instituted a demand for gloves possessing features other than warmth. These gloves must have first, firmness of texture as a protection for the hands when holding the steering wheel of the automobile or the golf stick; secondly, the gloves must be pliable so that the fingers of the wearer will not be handicapped by cumbersome yarn or weighty loops in the texture; thirdly, the gloves must look well. A dealer states that a girl asked for a pair of pogo gloves for the protection of her hands when holding the pogo-stick on which she hopped around in competition with other pogo-stick players. Pogoing was new to the dealer, but he was an auto owner and showed the girl a pair of nice looking, strong and pliable gloves similar to the kind he used when steering his car. The gloves were knit on the inter-lock plan and were satisfactory to the girl. This class of knitting is produced on a form of circular rib knitting machine by knitting on the odd cylinder needles and rib cylinder needles from one feeder and the even cylinder needles and the odd rib needles on the next feeder. This plan is continued on alternate feeders and results in a texture which is close-knit and hard wearing which features are required for gloves intended for the uses above enumerated.

Frequently in the manufacture of knitted gloves and similar articles of wear warping of the yarns is necessary because of the impossibility from single yarns from bobbins or spools. The character of the texture or the pattern of the fabric may require a considerable number of threads side by side on a beam or as often the case on flanged rollers.

In this case the threads are wound from the bobbins or cops on a reel in sections, each section carrying a certain number of ends. After the required number of sections are put on the reel, they are wound off on the beams or the flanged spools for the knitting process. Various colored yarns are arranged during the warping to comply with the designs of the articles to be knit. Not only knit gloves are wanted by the campers, golfers and auto enthusiasts, but knitted neckties, knitted scarfs, and a type of knitted fabric to throw over the shoulders in the cool of the evening are inquired for.

### The Market for Knitted Outerwear in Colombia.

There is a very good demand for knitted outerwear in the plateau regions of Colombia, due to the cool climate in these sections. In the lowlands the sale of such articles is very casual. The sale of the imported article is limited to the upper and middle classes, possibly a million out of the eight million population. The peons or laboring classes buy domestic made goods. Knitted coats, suits and capes are used but very little, the principal demand being for sweaters, shawls, mufflers and headwear.

There are no official statistics as to the output of the domestic industry and the firms themselves do not give out figures as to their production. The outerwear industry is centered principally in Medellin and Bogota. These mills, however, are comparatively small and their products are distinctly coarse in quality, of poor appearance, and do not compete with the better grade of imported goods, their sale being confined to the cheap lower class trade. In Medellen some of the mills turn out a small volume of higher grade goods, but these are not equal to the high grade American or French products.

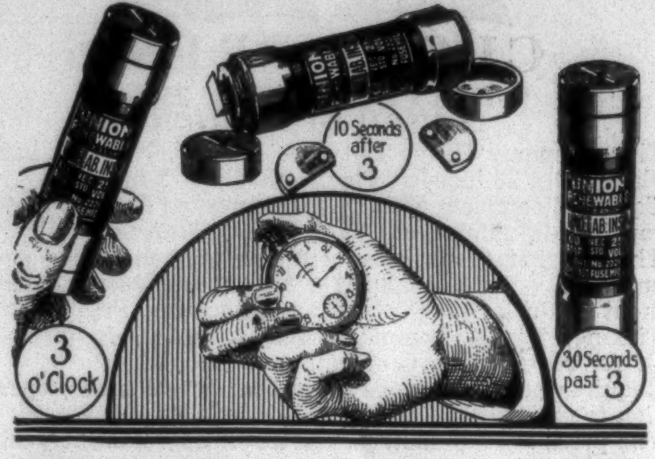
This product is classified in the tariff as "tejidos de punto; ropa hecha exterior." Plain cotton knit goods pay $1.40 (pesos) per kilo; cotton with cotton lace of embroidery, $2; with silk embroidery or adornments, $2.40. Linen knit goods pay $1.60 per kilo; with silk embroidery or adornments, $2.60. Wool knit goods pay $3 per kilo. Silk knit goods pay $4 per kilo. All these figures are on gross weight.

Local freight charges are as follows: By river from Barranquilla or Cartagena to Puerto Berrio (for Medellen) and to Girardot (for Bogota); by train from those points; total charge, either place, Medillin or Bogota, 14 centavos per kilo. Parcel post charges depend on country of origin, but result somewhat higher, especially as there is a surcharge of import duties of 10 per cent on parcel post imports.

These depend primarily on the credit rating of the importer. To reliable houses they range from 90 days sight to 120 days' delivery, from American exporters, while British houses frequently allow 180 days after delivery.

There is a heavy competition in knitted outerwear setting in now from Germany, due to low prices caused by the depreciation of the German mark. France comes second in this trade, its heaviest business being in shawls ("Mantillas") and caps. The United States ranks third. British firms compete rather strongly in knitted outerwear articles for use in athletic sports.

A list of firms in Colombia interested in importing knitted outerwear articles may be obtained from the Textile Division, Bureau of Foreign and Domestic Commerce, by reference to File No. 13440.



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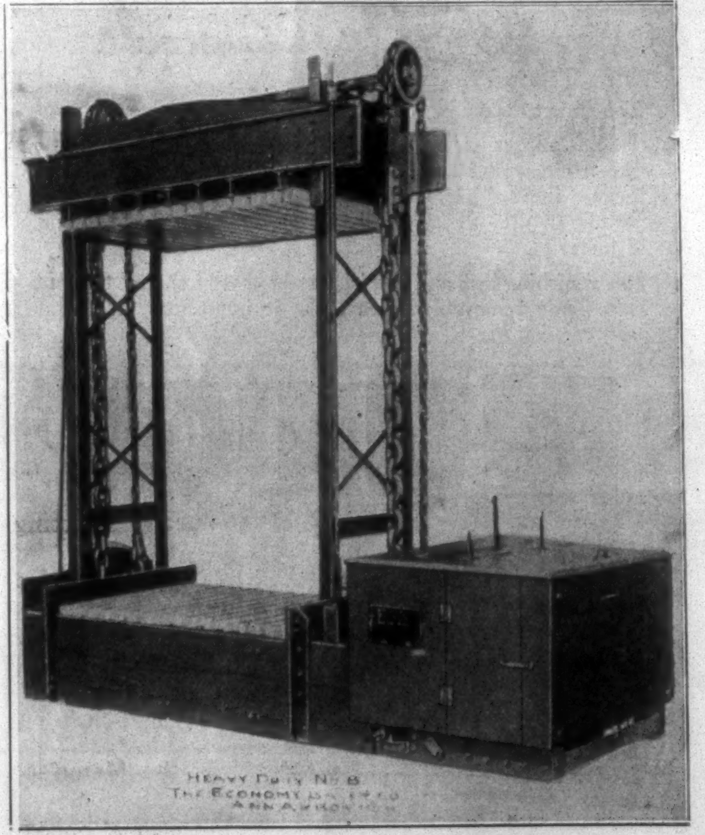

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# Practical Discussions
By
# Practical Men

### Card Settings.

Editor:

I notice one of your readers, "Waste," is having trouble getting his card strips to suit him. If he will try the following settings he will get results: Flats first stand 12; second 10; third 10; fourth 11; fifth or back 12; front plate at top 24; at bottom 29. See that the cards are set to gauge and not to crook in gauge.

I would like to give Waste the following settings for his cards. I suppose they are 40-inch cards; feed plate to licker-in, 12; licker-in to cylinder, 10; screen to circle, 29; screen to cylinder 34. Taper to one-eighth at front. Set mote knives close up so they cannot rub flats. Set front stand 12; second 10; third 10; fourth 11; fifth 12; front plates according to strips desired. I suggest same as back; doffer 7; comb 15. Make web as heavy as draft will allow, not lighter than 70. If he has trouble then, he better look back to the picker room.

Grinder.

### Card Settings.

Editor:

I note a question on your Discussion Page relative to card settings and card strips. Of course the card settings are always governed by amount of the stock being run and its quality and the percentage of waste wanted out. I have seen a great many rules for settings cards, and it is hardly practical to go into details as to the settings for all of the various parts. We know that card setting is very important and is essential to good carding.

After card has been ground, and before the settings are made, the card should be thoroughly brushed out to remove all loose emery and broken teeth, and then the man in charge must see that his gauges are in condition. You cannot get a close setting when gauges are mashed or have dents in them. The flat gauge should just reach the space of one flat. If it is longer than this it should be cut off the exact length. I think it useless to mention all the setting points, and just how this should be done, for as one class of carding calls for close settings, another for wide settings, it is impossible to give a correct answer to all, but will say the flats should be set from back to front in a V shape. Begin the settings for medium cotton, by setting back to 11, ending with a 9 in front. It is not a practice among all to set flats after each grinding, but it should be done.

Cylinder screens should be examined very often to ascertain that they are in good condition. Many times the triangular cross bars become loose, and special attention should be paid in placing them back, that they are perfectly level, or correspond with the rest of the bars. These bars should be set in such position as to allow the fibers to stand out just enough to come in contact with the doffer, while the cylinder is making its revolution. Should the settings be wider than this, the fibres will fly loose and go in the waste chamber. The man in charge should see that all nuts are kept tightened, as there are many points of teeth faced on account of this carelessness.

Be certain that the licker- in is in good condition, as this is where the cleaning action takes place; and the breaking strength of the output depends very largely on this point. Many times the licker becomes dull and needs sharpening. This can be done by running the licker backwards, holding against the teeth a soft brick. This will greatly help matters. The next plan is to have made a sand box, with bearings on each end to gt the shaft of the licker, placing the licker in the bearings, and also have prepared a place to drive it about 50 r. p. m. Cover about half the diameter with sand. This will smooth the rough sides of the teeth, and cut the rust from the shell. When the licker-in is placed in the card, it must be ascertained that the weights are resting properly on the bearings, thus prevent the licker- in from taking the cotton into the cylinder before it should. This will keep the finer parts of the card wire from having heavier work to do.

Supt.

### Opening and Mixing Cotton.

Editor:

Many superintendents have to get along without the most improved opening equipment and there is always more or less trouble in working out a good system for opening and mixing. I am getting excellent results from a lay-out as described below:

First, have an opening room adjoining the warehouse, with bale breaker or breakers enough to care for the stock without crowding and have these breakers to discharge the stock into a mixing room. Have the stock taken from this room to automatic hopper feeder attached to a suction flume with condenser located in picker room back of breaker pickers. Stock dumped from condensor on to a wire screen and bin wired on three sides, back and ends, and open on side next to breakers and raised 10 inches from floor on open side and 24 inches on back side os it will be easily cleaned under-

(Continued on Page 25)

# *Why Cotton Goods Are Below Cost*

The following interesting analysis of the market situation comes from J. E. Latham, cotton merchant, of Greensboro, N. C.:

"It costs more to close down than it does to run," is the stock answer, and this thought is perhaps responsible for more distressed cotton goods than any other one cause.

Let me say at the outset that these remarks are not intended to complain in the slightest at the price of cotton, which is probably cheap enough, under the circumstances, nor do I wish to remotely suggest that a reduction of wages of textile workers would be desirable or helpful at this time.

Cotton goods are too cheap for other reasons. Lower priced cotton and cheaper labor will not cure over-production.

Middling cotton without any particular staple merit is costing Southern mills about 34 cents per pound landed, and where the cotton has any merit as to staple, it fetches from one to several cents per pound more. Cotton yarns and cotton goods are not in good demand and manufacturers cannot fabricate cottons at these prices without actual losses, ranging from "break even" to several cents per pound. This statement is made on the assumption that the goods and yarns are to be sold simultaneously with the purchase of the cotton, but at the present time this is very hard to accomplish, because the demand for goods and yarns is poor, and the tendency of prices is not upward.

Jobbers have found during the past twelve months that it was successful to buy cotton goods when their needs were compelling, and therefore they are not committed ahead for any considerable quantity of goods, and converters are also pursuing this same policy. Retailers are probably carrying a normal stock, and no more. The mills are unable to book their output ahead, because jobbers and converters are in a frame of mind to buy only as they are compelled to have goods. Mills are therefore making up goods for stock to be sold sometime hereafter, but when, and at what prices, eoch answers. The past year has given a tremendous output of goods, despite the fact that there has been curtailment in a number of sections, particularly in New England. The ultimate consumer has bought pounds of goods as he has rarely, if ever, bought before; therefore, where any better demand from this source is to come from is not apparent.

It appears that the mills must find some new uses for cotton goods, or some new fields in which to sell them, or curtail the production or face a situation nothing short of alarming.

In the past, a few situations, but less acute, have been cured by patience, but heretofore the demand has usually been poor because of monetary conditions, or because of unemployment of the masses. At the present time there seems to be an abundance of money, and interest rates are low and every one can borrow money that is entitled to borrow.

The masses are employed very profitably and have been over a long period, and statistics show that they have bought very freely, and therefore it is safe to conclude that there is no vacuum to be filled by purchases of the ultimate consumer.

There seems to be no precedent for mills stocking up their own warehouses with goods and yarns made of cotton at anything near the present level of prices, nor has there ever been such a difference between quoted prices of cotton as now represented between the summer and new crop months, except in the year 1920. The mills in 1920 were enjoying a period of prosperity hardly ever dreamed of, and were sold ahead for several months at very profitable prices. Perhaps it is in order to say that a great many of these goods were not delivered at the prices at which they were sold. The debacle of 1920-21 is still remembered by most people.

The consumption of cotton this cotton year has been large, but the mills that have made money are in the main limited to those who purchased their cotton early and did not sell their goods at the time of the purchase.

Some mills are running full time at present, hoping that something will turn up; some are running full time because they have been thrifty and can afford to lose some of their surplus and capital; many mills are running full time on exaggerated ego; in other words, their neighbors are running, and they do not propose to be outdone, even though it involves a hideous loss. If all the textile mills, acting independently, would adopt a maximum schedule of sixteen days per month until October 1st, it would probably stop goods from declining, and wage reduction would be unnecessary. Textile workers and mill owners know that some curtailment will have to be practiced before new cotton is available, and to have the curtailment gradual is certainly much better for both interests. My own opinion is that a time has come for consumption of cotton goods to more nearly catch up with production. If the mills have sense enough to adopt this idea, or something better, then the mills, the workers, the jobbers, the converters, the cutters-up, the cotton dealers, and the cotton farmers will all be greatly benefited. The combined interests can then enter the new crop without violence and without a lot of old sores. Buyers of cotton and of cotton products will have keen appetites, and textile workers will welcome full time and profitable employment.

"It ain't the guns and armaments, nor the army as a whole, but the everlasting teamwork of every bloomin' soul." J. E. Latham.

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### Mexico Has 167 Textile Mills.

Washington, Jan. 29.—The Mexican Department of Industry, Commerce and Labor has recently issued a report stating that there are in Mexico 167 textile mills employing 46,644 men at an average daily wage of 2.64 pesos (peso equals approximately $0.483 at current exchange.)

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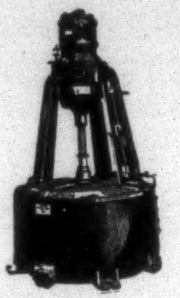

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**For Value Received**

The value of a dollar expended on mill supplies depends upon the care with which it is invested and the results obtained from what it purchases.

When you invest in the special purpose alkalies

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you obtain from their use a softer texture, brighter color, more even dyeing, and better quality appearance to your textile fabrics.

These results insure such a superior appearance and feel to textile products that hundreds of textile manufacturers are benefiting by the advantage they provide in a competitive market.

"Wyandotte"

The J. B. Ford Company.

So confident are we of the truth of these facts and of the ability of these products to produce these results that we guarantee them to be and do all that is claimed for them or the trial costs nothing.

**Ask your supply man**

The J. B. Ford Co., Sole Mnfrs., Wyandotte, Mich.

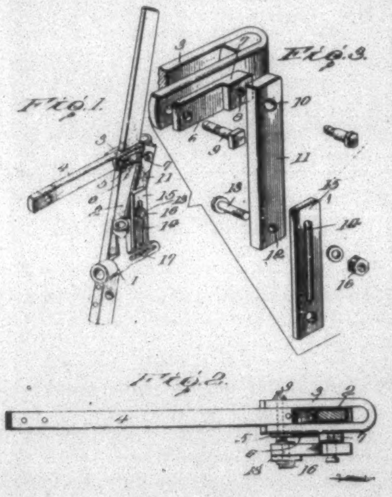
# *Power-Stick Adjuster for Looms*

Eugene Gadue, of Winooski, Vt., has invented certain new and useful improvements in power-stick adjusters for looms, of which the following is a specification, reference being had therein to the accompanying drawing.

This invention relates to certain new improvements in power stick adjusters for looms, the object being to provide a power stick adjuster which is exceedingly simple and cheap in construction and one which enables a finer adjustment to be obtained.

Another and further object of the invention is to provide a power stick adjuster which prevents the breaking of the picker stick, the wearing of the lug strap and one which steadies and holds the sweep stick and lug strap in its proper position.

Another and further object of the invention is to provide a power stick adjuster which can be quickly adjusted, the parts being so arranged and connected that they are securely connected together so that all danger of the parts working loose in operation is prevented.



Other and further objects and advantages of the invention will be hereinafter set forth and the novel features thereof defined by the appended claim.

In the drawings,

Figure 1 is a perspective view of a rocker, picker stick, lug strap and sweep stick of a shoddy or worsted loom showing the application of his improved construction of power stick adjuster;

Figure 2 is a top plan view with the picker stick in section. and

Figure 3 is a perspective view of the power stick adjuster, the parts being separated.

In the drawing 1 indicates the rocker arm, 2 the picker stick, 3 the lug strap and 4 the sweep stick of the ordinary construction of shoddy or worsted looms now in use, the rocker arm being provided with a horizontally disposed socket to receive the rocker shaft and a vertically disposed socket to receive the box rod for supporting the shutter box, the above description being given so that the operation of his improved construction of power stick adjuster can be readily understood.

Secured on the lug strap by bolt 5 is a plate 6 enlarged as shown at 7 having a threaded bore 8 into which is adapted to be screwed a bolt 9 passing through an opening 10 formed in the upper section 11 of his power stick adjuster, said upper section being preferably formed of wood. The lower end of the upper section 11 is provided with an opening 12 through which extends a bolt 13 adapted to extend through a slot 14 formed in the lower section 15, said section being preferably formed of a strip of metal. The bolt 5 passes through the legs of the lug strap and sweep stick for securing the strap and plate thereto.

By this construction the two sections can be adjusted in respect to one another and securely locked by a bolt or washer 16. The lower end of the section 15 is provided with an opening through which extends a stud 17 working in a slot formed in the rocker as clearly shown in Figure 1.

From the foregoing description it will be seen that he has provided a power stick adjuster forming a connection between the lug strap and rocker arm in such a manner that the two sections of the adjuster can be adjusted in respect to one another and securely held in adjusted position.

A power stick adjuster for looms, comprising a picker stick, a sweep stick having a lug strap surrounding said picker stick, a plate adapted to be secured to the sweep stick over the lug strap having an enlargement at its free end provided with a threaded bore, a sectional power stick having its upper section provided with an opening through which passes a bolt secured in the threaded bore of the plate for pivotally connecting said section to the enlarged portion of said plate, a bolt carried by the lower end of said section, the lower section being provided with a slot through which extends said bolt for adjusting said sections in respect to one another, a member having a slotted portion and a lug carried by the free end of the lower section extending through the slot of said member for loosely connecting said section to said member.

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### Page Men Have Convention.

C. W. Allison and J. D. Hill, of the General Equipment Company, Charlotte, have returned from Middletown, Ohio, where they attended the convention of the Page Fence & Wire Products Association. This organization is composed of the distributors of the Page Steel & Wire Co., of Bridgeport, Conn., which has the exclusive rights to sell wire from Armco Ingot Iron, which is the purest iron known to science, the billets being secured from the American Rolling Mill Company, of Middletown. While there Mr. Allison and Mr. Hill had the very interesting experience of going through this immense plant and seeing the process of melting the iron ore and scrap, then rolled into sheets entirely by machinery, while red hot, and finally galvanized. The General Equipment Company has been selling wire link fences for several years for enclosing cotton mills, using the Armco wire link, and Mr. Allison read a paper on "Specializing on Armco."

### New Catalog From Merrow Machine Works.

The Merrow Machine Company, Hartford, Conn., has just issued a new English edition of their illustrated catalog which has just been received from the printers.

In this edition they have made an effort to incorporate the numerous modifications and refinements in various models of our machines which have accumulated during recent years, and the catalog is therefore considerably larger than any previous edition. The issue contains detailed descriptions of the many styles of machines, and illustrations not only of these machines but also of samples of work performed by each principal type.

They desire to call the special attention of the trade to a new model, the 60-Q Machine, fully described in the catalog, a machine for producing a very small shell stitch in combination with the overedge stitch, especially effective on infants' undergarments. Another feature which they believe will be of particular interest is the shipping infromation supplied for the various machines, including gross and net weights, dimensions, cubic contents and a five-letter code word for use in ordering. While convenient for the domestic customer ordering by telegram, this latter feature will be recognized as of the greatest benefit to the foreign buyer who depends on ordering by cable.

Other features of the catalog make it a complete source of information as well as a practical aid not only to the present users of Merrow machines but also to prospective customers.

### Loray Mill Executives Hold Get-Together Meet.

Gastonia, N. C.—Superintendents, executives, overseers and members of the office force of the Loray Mills, the local plant owned and operated by the Manville-Jenckes Company, of Pawtucket, R. I., held their first get-together meeting and dinner at Cleveland Springs Hotel Tuesday night. There were 60 present and every one of them enjoyed the occasion to the fullest extent. The dinner was from 8:30 to 11 o'clock. Ken Glass in monologue and the Kiwanis quartet in song added much to the pleasure of the evening. The dinner was served by the hotel management and was a most excellent one.

### Half of Greenville's Mills Working Nights.

Greenville, S. C.—All Greenville mills are running at full time, and more than half of them are operating from one-fourth to three-fourths of their plant at night. No evidences of curtailment have made their appearance here. More than one mill official says, however, that the demand for goods is far from being good.

In addition the full time operation of all plants, the following mills are operating at night: Judson Mills, operating 20,000 spindles, or more than one-third of its entire number; a portion of thre carding and spinning machinery is being operated at night by Dunean mills; about 60 per cent of the Woodside mill, the largest textile plant here, is operating at night; the American Spinning Company is operating about 25 per cent at night.

The Mills Manufacturing Company is operating full time with the exception of the cloth room. Camperdown Mills is operating about one-third of its machinery at night. No night work is being done at Poe or Brandon, with the exception of the Apalache plant. No night work is being dnoe by the Victor-Monaghan Mills. The Poinsett Mills is operating about one-third of its equipment at night.

### South Seen as Future Textile Center

That the South will be the future center of the textile industry because it is closer to the raw material market, is the prediction made by Joseph H. Zens, president of the National Association of Hosiery and Underwear Manufacturers, who recently commented on the situation. Mr. Zens has resigned as president and general manager of the Milwaukee Hosiery Company, following his selection as president and general manager of the United Hosiery Mills Corporation, Chattanooga, Tenn., where he will make his future home.

"The South is rapidly becoming the textile center of the country, primarily because of climatic conditions and its nearness to the supply of raw material," said Mr. Zens. "The general belief that cheap labor is the reason is a mistake.

"Everything points to a cotton famine within another year or two. The crop last year was only a little more than half the normal quantity. It was hoped that the cold snap about two weeks ago, which was general throughout the South, would freeze out the boll weevil but it did not. The weevil threatens next year's crop."

Called to Chattanooga last April in an advisory capacity, Mr. Zen's selection as president and general manager of the Southern corporation is the result of his introduction of many Northern ideas making for greater efficiency in the operation of the company's six hosiery mills in Tennessee and Alabama.

### "Cost Finding in Knitting Mills."

Stephen R. Gordon, recognized authority on cost accounting, has contributed a very useful and valuable book to the knitting trades. His volume, "Cost Finding in Knitting Mills," published by Bragdon, Lord and Nagle, presents the subject in a very practical manner and will prove of material benefit to those who are studying better cost methods.

"Cost Finding in Knitting Mills" contains two hundred pages, charts and complete forms for determining costs in a knitting mill. It will prove an invaluable aid to knitters who wish to take up study of this vital phase of their business.

The price of the book is $4.50. Orders for it can be placed with the Clark Publishing Company, Charlotte, N. C.

"BRETON"
MINEROL "F"
BORNE SCRYMSER COMPANY
BRETON
MINEROL
F
NEW YORK
For Cotton Print Goods
*"It softens uniformly the blotch"*
**BORNE, SCRYMSER CO.**
*Established 1874*
17 Battery Place, NEW YORK
BOSTON PHILADELPHIA
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THE DAY OF SPECIALISTS

In the past twenty-five years hundreds of TEXTILE MANUFACTURERS have SAVED THOUSANDS of DOLLARS by having us Overhaul their Spinning and Card Room Machinery.

We employ 50 Skilled Overhaulers, Spindle Straighteners, Flyer Balancers, Carders and Spinners and GUARANTEE SATISFACTION.

NOW, while we are passing through this readjustment period is a good time to have this work done.

**Southern Spindle & Flyer Co., Inc.**
"We Manufacture,
Overhaul and Repair Cotton Mill Machinery".
Charlotte, N. C.
W. H. MONTY,
Pres. and Treas.
W. H. HUTCHINS,
V. Pres. and Sec'y.

SOUTHERN
TEXTILE BULLETIN
Member of Audit Bureau of Circulations

Published Every Thursday by
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THURSDAY, FEBRUARY 7, 1924

| | |
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| D. H. HILL, JR. | Associate Editor |
| JUNIUS M. SMITH | Business Manager |

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ADVERTISING
Advertising rates furnished upon application.
Address all communications and make all drafts, checks and money orders payable to Clark Publishing Company, Charlotte, N. C

## The South's Position.

THE statistics published in our Annual Review Number last week hold forth the promise that within the next few years the South will have fulfilled the prophecy that it is to become the textile center of the country.

During the year, our records show that the Southern mills added 730,812 spindles to their equipment. This figure does not include machinery that was bought for replacement purposes. This record is really remarkable when it is considered that 1923 was not a prosperous year for the mills.

During the past ten years, the average spindle increase in the South has been 446,791 annually. In 1914 the Southern mills operated a total of 13,478,297 spindles. The total now stands at 17,162,599.

Ten years ago the New England mills operated approximately 6,000,000 spindles more than Southern mills. During that period, the South has cut down this lead to approximately 3,000,000 spindles.

The mills of the United States operate approximately 36,000,000 spindles. Slightly less than half of these spindles are located in the South, the remainder being in all other States, principally in New England.

Although Southern mills operate a little less than half the spindles of this country, this figure becomes insignificant when activity of the textile industry in the South and in other sections is compared. It is estimated that the textile mills of the United States spend $10,000,000 each week for machinery, equipment and supplies, exclusive of raw material. Of this amount, two-thirds is spent by Southern mills. These figures very clearly indicate how textile development in the South is overshadowing that in other sections. In point of money invested in textile expansion in each year, the South is already the center of the industry.

A very interesting and significant feature of the textile situation last year was that many of the large textile machinery firms, finding that they depend on the South for the bulk of their business, established branch plants in the South. We believe that the next few years will bring a steadily increasing number of these firms to the South. Only this week one of the largest and best known manufacturers of finishing machinery announced detailed plans for locating a large plant in the South.

The South, as the logical center of cotton manufacturing in the world, is rapidly coming into its own. In New England, some of the leading mill men are stating that the zenith of textile development has been passed there and that future development will be confined to the South. They predict that in time, New England equipment will gradually be transferred to the South.

Disregarding all prophesies and considering the future purely in the light of the past, the record of past years is certainly a plain indication of what we may expect in the future.

## Our Advertising.

IT is very gratifying to us that the Southern Textile Bulletin has kept pace with the remarkable growth of the textile industry in the South during the past few years. Just as the mills have steadily expanded, so has our publication grown in circulation, influence and advertising. We have steadily maintained our position as the leading textile publication of the South and feel that we have contributed our part in upbuilding the prestige of the South's greatest industry.

The constant growth in our advertising patronage is due to our leadership in a field to which our advertisers must now look for the greater part of their business. Textile machinery and supply firms are looking Southward, and find in the Southern Textile Bulletin the logical medium for getting their products before the cotton manufacturers of the South.

For years our journal has carried, without interruption, the advertising of a large number of the leading machinery and supply firms of the country.

Recently many others have decided to become regular users of our advertising columns. Among the latter firms are Edward H. Best & Co., General Electric Co., Greist Manufacturing Co., Henry L. Scott & Co., H. & B. American Machine Co., Howard Bros. Manufacturing Co., Sayles Finishing Plants, I. B. Williams & Sons, Fales & Jenks, Dary Ring Traveler Co., Eclipse Textile Devices Co., Jackson Hill & Co., Minter Homes Co., National Ring Traveler Co., Palmetto Loom Reed & Harness Co., and the Root Co.

Among the firms who have been regular advertisers with us for a long period, the following have recently decided to very materially increase their advertising space with us: Draper Corp., Cyclone Fence Co., Crompton & Knowles Loom Works, Franklin Process Co., Emmons Loom Harness Co., Rogers Fibre Co., Steel Heddle Manufacturing Co., Shambow Shuttle Co., S. K. F. Industries, Stein, Hall & Co., Southern Wood Preserving Co., Whitinsville Spinning Ring Co., American Textile Banding Co.

Our list of advertisers is increasing steadily because the Southern Textile Bulletin is read regularly by the executives, superintendents and overseers of the Southern mills. It reaches both the men who buy for the mills and those who influence the buying.

The Southern Textile Bulletin, the home paper of the Southern mill men, has not failed to measure up to the progress that the mills themselves are making.

## Calhoun Yarn Mills.

Calhoun, Ga., Jan. 24, 1924.

Clark Publishing Co.,
Charlotte, N. C.

Gentlemen:

We acknowledge with thanks a copy of Clark's Tables of Manufacturing Margins on Weavings Yarns.

We consider this table a great help to Southern mills, and if this does not open their eyes to the real condition of selling prices for yarns the bankrupt court will entertain them in the near future.

For a long time the writer has realized the poor cost systems used by Southern mills, and more especially the yarn mills, and has often wondered just how they could stay out of the receiver's hands.

Yours very truly,
Calhoun Yarn Mills,
S. O. Gillespie, Treas.

## Agrees With "Southern Spinner."

The following statement is contained in a letter from a prominent mill executive of Georgia:

"I have read with deep interest the letter addressed to you by 'A Southern Yarn Spinner' and published in your valuable paper of the 24th inst.

"Unless this man's suggestion is carried into effect, he is exactly right in saying we will never prosper. We have been accepting offers at cost or under, for months, simply because our commission men wire us about as follows: 'Your price all out of line; other mills offering so-and-so; shall we sell at so-and-so?' Then, in desperation, we look around at our mill and the help we have spent years in selecting and training and ask ourselves the question: Can we afford to close down, possibly for months, lose all our good help and let our machinery rust out? We think we can't, so wire, 'Will accept your price for so many thousand pounds'—enough to keep us going for a week or two, sometimes a month. Then when that time is up, the same thing happens again. How can we continue this worse than foolish practice?'"

## Business Outlook Bright.

Confidence in the business outlook for 1924 has been measurably strengthened since the turn of the year, according to the Guaranty Survey, published by the Guaranty Trust Company of New York. Activity in some lines is exceeding most expectations, this review points out, and the steady price index has contributed an important element of strength to the economic situation.

Buying, it is suggested by the Survey, is still generally conservative, but as deliveries are relatively prompt "conditions in most branches of business do not call for heavy inventory accumulations." A significant feature of recent prices, it is declared, is the comparative steadiness of their averages.

## European Competition Not To Be Feared.

I cannot see how Europe can adversely affect the United States for some years, or until cheap labor there produces a surplus to compete with the United States. But the moment it begins to produce that surplus the labor there will be higher. It will be many years in my judgment before Europe will be in position economically to produce any large surplus competing in our home markets. In European development the field for European exports is in South America, Africa nad the East.

In 1924 the United States is going to continue to rotate on its own basis with maintenance of its own standards and independent prosperity.

We are producing, consuming and saving about as much as the whole civilized world two generations ago.

What the world once was the United States now is—and more, too.—Clarence W. Barron, president of Boston News Bureau.

## "Facts About Southern Mills."

The statistics and other valuable information regarding the textile industry of the South, which appeared in the Annual Review Number of the Southern Textile Bulletin, will soon be published in pamphlet form. This booklet, on account of its value for reference purposes and because it contains information not available anywhere else, has been widely distributed in recent years. Requests for copies should be filed at once.

# Personal News

J. T. Tidwell has resigned as superintendent of the Judson Mills, Greenville, S. C.

Joe Gribble, superintendent Monarch Cotton Mills, Dallas, N. C. and wife are on a pleasure trip to Florida.

G. W. Corn, from Erlanger Mills, Lexington, N. C., has accepted position of night weaver at Cramerton, N. C.

M. C. Green, of the Pomona Mills, Greensboro, N. C., has accepted the finishing and treating, shrinking and spinning at the Gambrill and Melville Mills, Bessemer City, N. C.

S. C. Simmons has resigned as active vice-president of the Cannon Manufacturing Company, at Concord and Kannapolis, N. C.

Luther Brown has been elected active vice-president of the Cannon Manufacturing Company, at Concord and Kannapolis, N. C.

Prof. Thomas Nelson, head of the Textile School at the North Carolina State College, was in Charlotte on business this week.

Charles H. Stone, who formerly held a position with the Charlotte office of the Grasselli Chemical Company, has again become connected with this firm, making headquarters at 23 West First street.

J. E. Porterfield has resigned as second hand in the Osprey plant of the Bibb Manufacturing Company, Porterdale, Ga., to become overseer of carding and spinning at the Western Reserve Cotton Mills, Millen, Ga.

H. M. Deason has resigned the position as night overseer carding, spinning, spooling, twisting and warping with the Cardinal Mills, West Point, Miss., to accept day carding, spinning, spooling and warping with the Micolas Mills, Opp, Ala.

Gen. L. D. Tyson, prominent cotton manufacturer of Knoxville, Tenn., and former president of the American Cotton Manufacturers Association, and who commanded the 30th Division in France, has retired from the mill industry, having sold his interests this week.

A. M. Milliron, who is widely known in the textile industry in the South, has accepted a position as manager of the New York office of Hatheway & Reynolds. This company manufactures a high grade line of wool and worsted sweaters, coats and slip-overs, both men's and women's, and also worsted bathing suits for men, women and children.

T. B. Rector, who has been overseer of cloth room, Peerless Cotton Mills, for the last two years, has resigned that position and returned to his old home at Greer, S. C.

He was presented with several presents as tokens of esteem from both night and dap help. Also Mrs. Rector, who has been bookkeeper, was presented with a present from the help, who regretted very much to see them leave.

Mr. Rector has not accepted another position as yet.

### Irving Southworth Appointed Pacific Mills Agent.

Boston, Mass.—Irving Southworth has been appointed agent of the Pacific Mills to succeed Walter E. Parker, who now becomes agent emeritus in recognition of his many years of valuable service to the company, it was announced at the mill's office here.

Mr. Parker first came to Pacific Mills at Lawrence in April, 1881, and took charge of the cotton mills. In 1887 he became agent of the cotton and worsted mills and in 1892 agent of the whole plant, including the print works. The success and development of the Pacific Mills through all these years up to the present time has been in large measure due to Mr. Parker's untiring efforts and unusual ability, the company's announcement states.

Mr. Southworth, whose appointment as agent becomes effective at once, first came to Pacific Mills in June, 1910, as superintendent of the cotton department in Lawrence. In 1914 he assumed charge of the Cocheo Department at Dover, N. H., and in June, 1916, became agent of the newly acquired Hampton Department at Columbia, S. C. His successful handling of each of these positions led to his appointment on March 1, 1920, as assistant agent in active charge of operations at all Pacific Mills plants, including the Hampton Department.

As agent, his responsibilities will include all plants of Pacific Mills, not only at Lawrence, Dover and Columbia, but also the new plants being erected at Lyman, S. C.

### Crawford Cotton Mills.
### Crawford, Ga.

5,000 spinning spindles; 98 looms.

| | |
|---|---|
| J. M. Creekmore | Supt. |
| E. P. Dewberry | Carder |
| G. M. Holcomb | Spinner |
| L. L. Allison | Weaver |
| J. R. Ozburn | Cloth Room |
| C. M. Floyd | Master Mechanic |

### Rodman-Heath Co.
### Waxhaw, N. C.

6,240 spinning spindles; 30-2 skeins and warps.

| | |
|---|---|
| Thos. W. Harvey | Supt. |
| H. L. Tucker | Carder |
| H. L. Tucker | Spinner |
| W. P. Mullis | Master Mechanic |

### Fort Mill Manufacturing Co.
### Fort Mill, S. C.

21,664 spinning spindles; 400 looms.

| | |
|---|---|
| G. W. McKenzie | Supt. |
| W. G. Mehaffey | Carder |
| J. B. Broadnax | Spinner |
| S. H. Wyle | Weaver |
| S. R. Cook | Cloth Room |
| Allen Knight | Master Mechanic |

*Bobbins and Spools*

True-running Warp Bobbins a Specialty

**The Dana S. Courtney Co.**
**Chicopee, Mass.**
**Southern Agt, A. B. CARTER, Gastonia, N. C.**

Leno And Marquisette Weaving

Our leno doups for weaving marquisettes and fancy leno weaves are universally accepted as the only satisfactory solution of leno weaving.

In fact, by using our doups, any weave room with dobby looms can make a leno stripe as easily and at as low cost as any ordinary fancy fabric and, that, too, without any extra attachments to the loom whatever—no, not even a jumper or a slackener attachment is required.

**STEEL HEDDLE MFG. CO.**

GREENVILLE PHILADELPHIA PROVIDENCE

"Duplex" Loom Harness—complete Frames and Heddles fully assembled
Harness Frames
Selvage Harness
Leno Doups
Jacquard Heddles

SOUTHERN PLANT
Greenville, S. C.
HAMPTON SMITH
Southern Manager

Drop Wires
Nickel-Plated
Copper-Plated
Plain Finish
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# MILL NEWS ITEMS OF INTEREST

**Concord, N. C.**—S. C. Simmons has resigned as active vice-president of the Cannon Manufacturing Company here and at Kannapolis. He will be succeeded by Luther Brown.

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**Greenville, S. C.**—All local mills are running full time and half of them are operating from one-fourth to one-half of their equipment at night.

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**Calhoun, Ga.**—J. A. Strain, president of the Calhoun Yarn Mills, has purchased the Echota Mills No. 2, and will change the name to the Strain Cotton Mills.

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**High Point, N. C.**—The Piedmont Mills are contemplating extensive improvements to their plant, according to local reports. The company recently increased its capital stock to $500,000.

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**LaGrange, Ga.**—Recent large orders for cloth and yarn are causing the cotton mills of this city to operate day and night shifts. The local mills operating two shifts are: Dunson Mills, Hillside Mills, Unity Spinning Mills; New England-Southern Mills and the Dixie Mill. The source of the unusual large demand for cloth comes from the automobile industry, to go into seat and top material.

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**Selma, Ala.**—This city proposes to grant tax exemption to new textile industries locating here, the exemption to be goods from five to ten years. This action is a part of the campaign under way here to induce Eastern mills to locate in Selma, according to Morris Hohenberg, president of the Chamber of Commerce.

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**Columbus, Ga.**—Work has been started on an addition to the plant of the Georgia Webbing and Tape Company, the new building to be 100x90 feet. The company will rush the building to completion as rapidly as possible, and new equipment will be added as soon as the addition is ready. The mill is operating night and day and is said to have large orders on hand.

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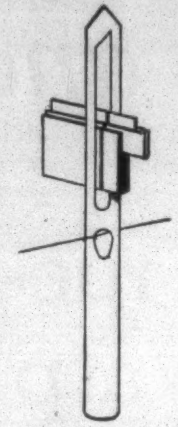
**Brenham, Tex.**—The South Texas Cotton Mills here, one of the oldest textile mills in the State, recently held its annual election of officers and directors. Reports submitted by officers of the company showed that the last year had been one of the most prosperous in the history of the company.

Directors elected are: D. C. Giddings, J. H. Simon, T. A. Adams, W. A. Searcy, W. B. Francis, William Seidel, Jr., A. A. Hacker, Fred Martin and T. A. Low.

Directors elected the following officers: D. C. Giddings, president and treasurer; J. H. Simon, vice-president; T. A. Adams, secretary and general manager.



Another Southern Mill orders K-A Electrical Equipment for a thousand looms. This is not an unusual occurrence, merely the natural outcome of investigation and trial of a superior device.

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**R. I. Warp Stop Equipment Co.**

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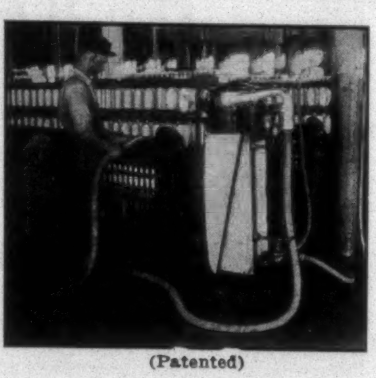

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**High Point, N. C.**—It is reported that the Highland Cotton Mills, which recently increased capital stock of $500,000, will considerably improve its plant.

---

**High Point, N. C.**—The Empire Hosiery Company, capital stock $100,000 authorized, has been incorporated by J. H. Adams, J. E. Millis and E. F. Redding. It is understood that the company will establish a plant to manufacture hosiery.

---

**Jonesboro, Ark.**—The board of directors of the Jonesboro Cotton Mills, Inc., at their meeting just held here, elected R. Lee Wilson, of Wilson, Ark., and W. F. Taylor, of Lunsford, Ark., additional members of the directorate. The site for the mill and mill village will be selected shortly, and a construction program carried out.

---

**El Paso, Tex.**—The management of the new El Paso Cotton Mills Company, which is erecting a cotton mill here, expects to be producing fabric by next October. Proposals went out February 1 for the building contracts. The products of the new mill will be denim, osnaburgs, chambrays and drills. The company was incorporated early in November, 1923, and capitalized at $500,000. It is proposed that the mill will be in every way equipped with the latest improved machinery and that the building will be most modern in all arrangements. At the start, it is stated that the plant will operate 5,000 spindles. A. P. Coles is president; J. P. Henderson, vice-president, and George C. May, superintendent. The directors are: Herman Andreas, C. N. Barrett, A. P. Coles, Winchester Cooley, T. Brahan Cunningham, Hayman Krupp, Gus Momson, James G. McNary, S. P. Skinner, W. H. Turney and Z. F. White.

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**Knoxville, Tenn.**—The Appalachian Mills, manufacturers of men's heavyweight cotton underwear, have purchased outright the entire good will, stock and equipment of the Knoxville Spinning Mills and the Tennessee Mills from Gen. L. D. Tyson and associates. The merger takes place at once. The purchase price has not been mentioned.

General Tyson retires to take charge of the Knoxville Sentinel, a Democratic afternoon newspaper, which he purchased from Curtis B. Johnson and associates.

The three mills employ approximately 1,600 workers and produce 6,000,000 suits of underwear yearly, the output being valued at from $5,000,000 to $6,000,000. The combined mills operate 40,000 spindles. Tyson established the Knoxville Spinning Mills in 1911 with 10,000 spindles. A few years ago started to manufacture underwear. He established the Tennessee Mills in 1916. In 1922 the two mills had an annual product of 1,200,000 pairs underwear. The approximate yearly payroll of the new enterprise will be $1,250,000.

Officers Appalachian Mills, J. T. Brownlee, president; Roy N. Lotspeich, vice-president, treasurer and general manager; T. L. Henry, secretary, and A. Warren, superintendent.

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**Griffin, Ga.**—Sale of the Kincaid Manufacturing Company to the Georgia Cotton Mills, a deal involving nearly three and one-half million dollars, is announced here. The report said the deal had been closed, though a meeting of the stockholders of both companies is necessary for confirmation.

The new corporation is to be known as the Georgia-Kincaid Manufacturing Company. The Georgia Cotton Mills, of which J. H. Cheatham is president and treasurer, and W. W. Norman is secretary, consists of 28,000 spindles and 900 looms, and employs 600 people. Terry and huck towels and dobby weaves are manufactured.

The Kincaid Mills consist of 47,000 spindles, 1,620 looms and employ 800 people. Allan Little is president and W. F. Ingram is secretary and treasurer. Towels, corduroys and table damasks are manufactured.

The combined corporation will consist of five mills, three Georgia and two Kincaid. The Kincaid is capitalized at $1,500,000. The report said the stock sold at 220, aggregating exactly $3,300,000, which is said to be the largest financial deal ever negotiated here.

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### Mecklenburg Mill Officials Indicted.

Greensboro, N. C.—J. D. Norwood, J. K. Doughton and M. L. Jackson, prominent Salisbury men, were indicted by the grand jury in the United States District Court on charges of abstracting and misappropriating funds from the Peoples National Bank, Salisbury, aggregating the amazingly large total of $325,131.

Norwood was indicted individually and Norwood, Doughton and Jackson together, it was disclosed. There are two counts in the indictment against Norwood, it was learned, while the indictment against the three men contains 16 counts. All three men have given bond, it is understood.

Frank A. Linney, district attorney, said neither his office nor that of the clerk of Federal Court had anything to give out concerning the indictments. The grand jury which has served during the present term of court was discharged by Judge E. Yates Webb. Just before it was discharged the grand jury returned several true bills, it is known.

The Peoples National Bank, of Salisbury, one of the largest financial institutions in that section of the State, closed its doors on the morning of June 8, 1923, and it is still closed. J. K. Doughton was formerly president of the bank, Norwood was chairman of its board of directors and Jackson was a director.

The Mecklenburg Mills Company, in which Norwood and Jackson were stockholders, admitted insolvency just before the Salisbury bank closed. It is common knowledge that the bank carried large quantities of the mills' paper. The closing of the Peoples National Bank, of Salisbury, and three smaller banks, one each in Spencer, Granite Quarry and Rockwell, was attributed to the failure of the Mecklenburg Mills, with a mill at Charlotte, the Mecklenburg, the Clyde and Newton Mills at Newton and the Nancy Mills, Tuckertown.

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Tallow, Soluble Grease, Soluble Oils, Gums, Glues, Gum Arabol, Lancashire Acme Size, Waxes, Finishing Pastes, Soaps, Glycerine, Ready-made Heavy Size, Sago and Tapioca Flours, Dextrines, China Clay, Soluble Blue, Bone Grease, Bleachers' Blue.

SPECIAL COMPOUNDS FOR WARPS, WHERE STOP MOTIONS ARE USED.

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HERBERT BOOTH, Tenn.-Ala. Representative, Chattanooga, Tenn.

### Plan Control of Cotton.

London, Jan. 27.—Progress is being made with a scheme for controlling the American sections of the Lancashire cotton spinning industry. Production will be regulated by a board of control and basic selling prices established with power to make levies on spindles.

A compensation fund is to be provided by master spinners and work people for purposes of making unemployment payments in the industry. The government will be asked to legally sanction this scheme.

### French Silk Fabric Exports Show Increase Over 1922.

French exports of silk fabrics for the first nine months of 1923 surpassed by 1,200,000 kilos those of the corresponding period of 1922 when 4,778,700 kilos were exported compared with 5,801,800 for 1923. With the exception of the Scandinavian countries, Belgium and Luxemburg, and Germany, shipments to all important foreign markets showed increases. Exports to the United States were approximately 1,100,000 kilos, or about 300,000 more than in 1922, Vice Consul Cyrus B. Follmer, Lyon, reports.

### Brazilian Imports of Cordage and Twine.

In 1922, Brazil imported 664,979 kilos (kilo=2.2046 pounds) of cables, hawser, and rope, and 21,138 kilos of cord and twine compared with 377,314 kilos and 36,548 kilos, respectively, for 1921. Receipts for the first six months of 1923 were 253,812 kilos of cables, hawser, and rope, and 24,904 kilos of cord and twine. The shipping business uses about 90 per cent of the cordage consumed, the principal demand being for manila, cables, hawser, and rope of all sizes. American binder twine is favorably known for its quality but purchases of this commodity have not been large, according to a very comprehensive report to the Commerce Department from Assistant Trade Commissioner M. A. Cremer, Rio de Janeiro, on "The Brazilian Rope and Cordage Market."

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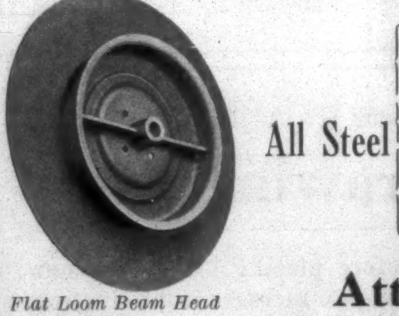

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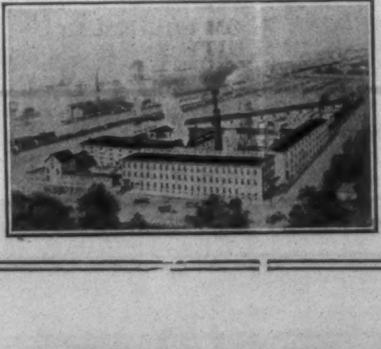

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**"HIGH GRADE"**

**Bobbins, Spools and Shuttles**

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### Practical Discussions.

(Continued from Page 16)

neath. Now you will be astonished at the amount of sand and dirt that will fall through this screen that would otherwise go into the pickers and besides the stock is getting a thorough airing all the time and is in fine condition for the pickers to clean.

As to making good even laps will say there are so many little things about picking machines that will cause them to make anything but good even smooth laps that will run off or unwind on the cards, that it is rather hard for me to know where to begin.

But one of the most important things is speed. Beaters and fans either too fast or too slow and nearly always too fast. The beater blades should strike the stock enough times to knock out the motes motes or the coarse motes at least and the fans should revolve fast enough to take care of the draft that the beater makes, no more and no less. If this is done and careful attnetion is given to the machines in general you will not be bothered with split laps. My card hands do not know anything about split laps, we are never bothered with them and we have no patent preventers and fancy double adjustable back action grids, just the plain Kitson regulation picker is good enough for anybody.

We find that a speed of 1,070 revolutions per minute for three blade beaters, breaker picker single beater machine and a fan speed of 880 revolutions per minute gives us the best results.

On intermediate single beater machine two blade beater, 1,340 revolutions and fan 840 revolutions and on finisher we have three bar Kirschner beaters that make 1,140 with fan speed of 900 revolutions, and we have no split laps, never. These speeds may not suit everybody but I got them by careful experimenting.

Another important thing in making laps is to have the grids properly set. My idea is that they should be open enough to let the motes out and not enough to waste good cotton, for we realize that cotton is expensive. As to closeness to beater they should be within one-half inch of beater blades and the bars. I do not like a very sharp edge, rather have them just a little round.

The pickers should be kept clean and it is not so important to keep them clean on the outside as it is on the inside, for they do their dirty work so much better if they are kept clean and well oiled. Pickers require quite a lot of attention to get good results.

Opener.

Wanted—By firm, already well established in South, a salesman familiar with bleaching and finishing. X. Y. Z., care Bulletin.

Wanted—First-class machinist for renecking steel rolls. State experience and wages expected. Permanent position. Box 298, Greenville, S. C.

Wanted — Man to straighten spinning spindles. State experience and wages expected. Permanent position. Box 298, Greenville, S. C.

Young woman with varied and successful experience in industrial programs would like, by April 15, welfare position giving promise of growth and expansion with progressive plant. Excellent references. L. A., care Southern Textile Bulletin.

We want reliable and capable representative in each town in North and South Carolina to sell life insurance, working part or all time. New policy. Good contract. Address Box 67, Shelby, N. C.

### Huge Looms to Weave 8,000 Pounds of Cloth a Week.

Baltimore, Md.—What is said to be the largest cotton loom in the world will be put in operation in the William E. Hooper & Sons Co. cotton mill this week.

The machine weighs 35 tons and cost more than $50,000. A bolt of cloth 22 feet wide, 900 feet long and weighing 8,000 pounds will be woven in the machine in a 48-hour week. The width of this bolt is said to be nearly seven feet greater than that woven by the largest loom now operating. The machine is fed with thread from 8,000 spools.

### Wholesale Dry Goods Men to Meet.

Tentative arrangements are in the making for the meeting of the Southern Wholesale Dry Goods Association in Charlotte the latter part of April or the first of May. Definite date has not been fixed yet, but will be set at a conference here shortly between C. A. Williams, of this city, members of the executive committee, and Norman Johnson, of Richmond, secretary of the association. Alfred H. Williams, of Nashville, Tenn., president of the association, will probably attend the conference.

The association has about 150 members, Mr. Williams, who is looking after the local end of the convention, says a great deal of interest is being manifested in the meeting and he expects one of the best gatherings here the association has ever had. The association was organized in Asheville 13 years ago.

Officers of the association are: Alfred H. Williams, of the Harris-Davis Company, Nashville, Tenn., president; Herman Levy, of the Levy-Loeb Company, New Orleans, and C. C. Henking, of Henking-Resener & Co., Huntington, W. Va., vice-presidents; W. R. Northen, of Strause Bros. & Co., Richmond, Va., treasurer; Norman Johnson, editor Merchants Journal, Richmond, Va., secretary. The executive committee consists of Tom Flaxman, Houston, Tex.; W. R. King, Memphis, Tenn.; David Ades, Lexington, Ky.; J. Ernest Briscoe, Knoxville, Tenn.; C. A. Williams, Charlotte, N. C.; Walter C. Barnwell, Atlanta, Ga.

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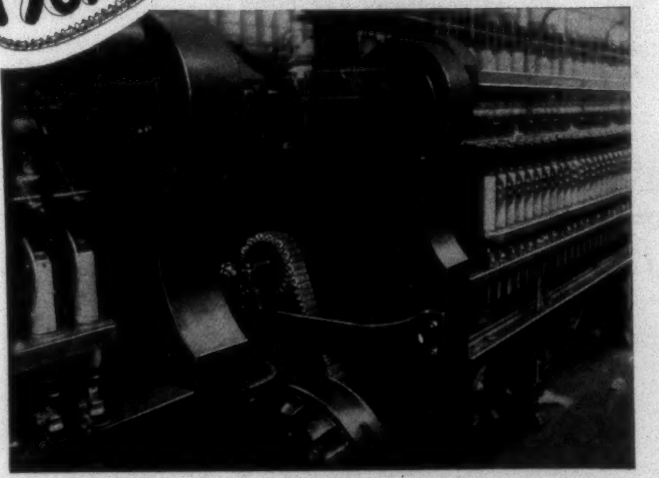

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Maximum Transmission of Power

Morse Silent Chain Drives give you the full benefit of the power developed by your motors. They insure maximum production by transmitting 98.6% of the motor's power to your machine.

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## Cotton Supply Outlook.

Of unusual significance is the monthly circular of "consumption and stocks of cotton in the United States," just issued by the P. T. Jackson Co. It says: "The consumption for December amounted to 461,560 bales vs. 529,342 bales during December, 1922, a reduction of 57,782, whereas exports amounted to the exceedingly high total of 845,581 vs. 607,853 during December, 1922, an increase of 237,728. Domestic consumption for the five months ending December 31, 1923, amounted to 2,510,472 bales, and the exports to 3,323,951 or a combined total of 5,834,423 vs. 5,568,721 for the same period ending December 31, 1922. With these statistics in hand, the following table is interesting:

**Carry-Over in the United States, July 31, 1923.**

| | Bales |
|---|---|
| In consuming establishments | 1,089,230 |
| Public storage and compresses | 938,689 |
| Elsewhere in the U. S. | 60,000 |
| Total | 2,087,919 |
| Estimated crop | 10,100,000 |
| Grand Total | 12,187,919 |
| Consumption and exports for 5 months ending Dec. 31, 1923 | 5,834,428 |
| Available supply for 7 months beginning Jan. 1, 1924 | 6,353,496 |

"The exports for the eighteen days of this month to date have amounted to exactly 391,975 bales indicating a conservative total of approximately 653,496 for the month. General estimates of this month's domestic consumption average around 500,000 bales or a total of 1,153,496, which would have only 5,200,000 supply for the six months beginning February 1." There has been some talk during the decline of the past few days that, through curtailment in the spring and summer months, the carry-over at the end of this season would be around 1,500,000 bales, says the circular. The firm accordingly has compiled a table to set forth the comparative figures showing "Exhaustion of Available Supply in the United States," through reduction of consumption and exports.

In this table it is shown that, to leave a turnover of 1,500,000 bales at the end of the season, the present monthly rate of consumption and export of approximately 1,200,000 bales would necessarily be reduced 48½ per cent from February 1, leaving it 617,000 bales. If the rate were reduced 38½ per cent, or to 742,000 bales, a carry-over of 750,000 bales would be left. If the rate were reduced only 27¾ per cent, leaving it 867,000 bales monthly, the supply would be exhausted completely by August 1; reduced to 13 1-3 per cent, or 1,040,000 bales, exhaustion would come by July 1, and the present rate would mean exhaustion by June 10, as shown simply herewith:

| Percentage Reduction Necessary | Allowing Monthly Consumption and Export Bales | Exhaustion Point | Carry Over Bales |
|---|---|---|---|
| 48½ | 617,000 | ...... | 1,500,000 |
| 38 1-5 | 742,000 | ...... | 750,000 |
| 27¾ | 867,000 | Aug. 1 | None |
| 13 1-3 | 1,040,000 | July 1 | None |
| 0 | 1,200,000 | June 10 | None |

"We believe that exports for February, March and April will average around 400,000 bales monthly," adds the circular. "We also believe that present orders on domestic spinners' books will call for an average consumption of at least 400,000 bales for these three months. Last season, the total exports amounted to 4,864,027 bales, but this was the smallest figure reached in the last twenty years, excepting the season of 1917-18 when they amounted to 4,476,121 bales. It is further interesting to note that exports have never gone under 4,000,000 bales since the season of 1884-85, when the yearly consumption in Great Britain and on the Continent amounted to only 5,350,000 bales as compared with this season's estimated consumption of 7,500,000 bales. That the large exports to date this season were needed is proven by the following figures showing comparison of present stocks:

| | Jan. 18 1924 Bales | Jan. 18 1923 Bales | Jan. 18 1922 Bales |
|---|---|---|---|
| Stock in Great Britain | 799,000 | 918,000 | 1,091,000 |
| Stock on Continent | 372,000 | 507,000 | 722,000 |
| Totals | 1,171,000 | 1,425,000 | 1,813,000 |

"Our conclusion after careful study of the above statistics is that the cotton manufacturing industry in this country is now approaching conditions similar to those that existed during the latter part of the Civil War."

## FOREIGN YARN TRADE NOTES.

The following is a special bulletin from the Textile Division, Department of Commerce:

### Belgium.

The middle of January witnessed an important development for cot-

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Against Dampness, Heat, Acids, Alkalies, Fumes—

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Silica-Graphite
PAINT

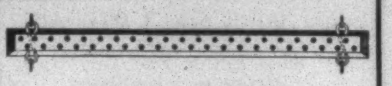
Its wear-resisting qualities have been proved. For over fifty years DIXON'S has been the standard protective paint for all wood or metal surfaces. Nature's mixture of silica and flake graphite, mined only by ourselves, is the base of this remarkable time-defying paint.

Write for Booklet 176-B.
JOSEPH DIXON CRUCIBLE COMPANY
Established 1827 Jersey City, N. J.

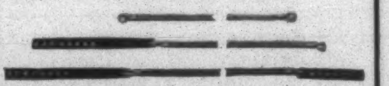
**Mill For Sale.**
A good 3,000-spindle mill, with space for 10,000 spindles, and good hydro-electric power. M. B. Pitts, Elberton, Ga.

**Joseph L. Davidson Co.**
Established 1889
*Designing Card Stamping Repeating*
FOR ALL TEXTILE FABRICS
*2525 N. Second St, Philadelphia, Pa.*

**Improved Dobby Chain**



**Dobby Cords**



**Rice Dobby Chain Co.**
**Millbury, Mass.**
**Send Us Your Order To-day**

*Save in freight by using*
**WILTS**
Veneer Packing Cases
They are lighter and stronger, made of perfect 3-ply Veneer Packing Case Shooks. A saving of 20 to 80 pounds in freight on every shipment because of extreme lightness. Stronger than inch boards, burglarproof, waterproof and clean. Write for prices and samples. Convincing prices—Quick service.
**Wilts Veneer Co., Richmond, Va.**

MANUFACTURED ONLY BY NICHOLS MFGR. COMPANY ASHEVILLE, N.C. U.S.A.
GOOD AS THE BEST AND THEN SOME
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Charlie Nichols
CLEANSER
TRADE-MARK REG. U.S. PAT. OFFICE

BALDWIN COTTON MILLS
Chester, S. C.
K. C. Etters, Supt.
Regarding your MI-CLEANSER as a SCRUBBING POWDER, will say that we have been using MI-CLEANSER for several years, and find it to be one of the BEST SCRUBBING-POWDERS we have ever used.

**CHARLIE NICHOLS**
**Pres., Treas. & Genl. Mgr.**
**NICHOLS MFG. COMPANY**
**Asheville, N. C., U. S. A.**

ton spinning in the shape of the resumption of relations, hitherto suspended, with German consumers, and an extremely strong demand from that source. While the French demand for yarn is still sustained, it is believed that the rapid depreciation of the French and Belgian francs will shortly interfere with sales to some degree. Domestic weavers are still buying steadily. Local yarn prices are somewhat under parity with raw cotton quotations, and higher prices are likely as soon as present stocks of raw cotton are exhausted. Cotton yarn exports during November increased 200 per cent over October, due to large shipments to Great Britain and the Netherlands. — Cable from Acting Commercial Attache Samuel H. Gross, Brussels, January 22.

### China.

The quantity of foreign cotton yarn imported into Foochow is not important, in comparison with the native product brought from Shanghai. Total importations of foreign yarn during the nine months' period of 1923 were about 60,000 pounds as against nearly 3,300,000 pounds of native yarn. The quantities of cotton yarn marketed in this district show little difference during the three periods under comparison, running about the same from year to year.—Consul John R. Putnam, Foochow, December 4, 1923.

### France.

American cotton yarns contineud their upward trend carrying Egyptian with them. Spinners are falling back on Indian yarns, others being too high. The industry finds itself in a difficult position, manufacturers not being supplied with yarns to cover their engagements. Business was quiet throughout the month and reported as absolutely stagnant at the end.—Vice Consul Davis B. Levis, Havre, December 11.

### Czechoslovakia.

The textile trade of Czechoslovakia is not improving as rapidly as other trades due partly to the fact that cotton yarn has recently increased approximately 33 per cent in value. It is reported that several textile factories will be forced to reduce production on account of the increased prices in cotton yarn—Consul C. S. Winans, Prague, December 5.

### Germany..

In the Munchen-Gladbach district business has been quiet in recent weeks, the uncertain political and economic conditions causing consumers to adopt a reserved attitude. Only small sales covering the most pressing immediate demand were made. English and Belgian spinning mills are beginning to offer their yarns on the German market and usually are able to undersell German firms. As many cloth mills have reduced working hours, the consumption of yarns has decreased. —Vice Consul Christian T. Steger, Dresden, December 1, 1923.

### England.

Although there was a drop in the total exports of piece goods during the month of November, it is interesting to note that the exports of grey yarn amounted to 13,032,000 pounds, which was the highest for the year.—Trade Commissioner Hugh D. Butler, London, December 15, 1923.

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**BARNWELL BROS.**
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Shippers——COTTON——Exporters
Selecting Benders and Staples a Specialty
Buying Agencies Throughout the Delta
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Most careful personal attention to shipments of every sale to secure most perfect uniformity of staple and character.
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Special Attention to Mill Orders
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Mississippi Delta Staples
Home Office
Memphis, Tennessee

**S. L. DODSON & CO.**
Cotton Merchants
Domestic—Export
BENDERS AND STAPLES
Main Office: Clarksdale, Miss.

**B. F. OLIVER & CO.**
Cotton
Staples and Benders
Clarksdale, Miss.

H. Chassaniol
**CHASSANIOL & CO.**
High Grade Staple Cotton
Experienced Handlers of Low Grade Staples
GREENWOOD, MISSISSIPPI

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CLARKSDALE, MISS.
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Cotton
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**I. L. JONES & CO.**
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**COMPLETE DYEHOUSE EQUIPMENT**
Special Machinery For Textile Mills
**The Klauder-Weldon Dyeing Machine Co.**
**Bethayres, Pa.**

WELL DRILLING AND DEEP WELL PUMPS
We do the engineering, and have had 32 years experience solving water problems satisfactorily for textile mills.
Sydnor Pump & Well Co., Inc.
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A Co-operative Marketing Association for the Benefit of Its 55,000 Cotton Grower Members
Cotton Classed and Sold in Even Grades and Staple
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**RUSSELL-ROBERTS COTTON COMPANY**
**Cotton**
All grades of Oklahoma Cotton
We buy direct from the Farmer, and would like to do a regular business with some good mill.
**Holdenville, Oklahoma**

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**COTTON**
Buyers and Exporters
Members Texas Cotton Association, New Orleans Cotton Exchange
Codes: Meyers' 39th Edition, Shepperson's 1878-1881
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Member Okla. State Cotton Exchange
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**Western Oklahoma Cotton**
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FROM OUR OWN MINES
New River and Pocahontas
High Volatile Splint and Gas
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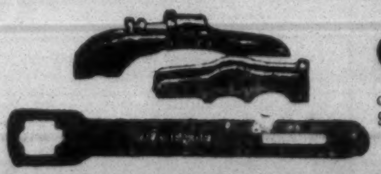

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Use Dixon Patent Stirrup Adjusting Saddles, the latest invention in Saddles for Top Rolls of Spinning Machines. Manufacturers of all kinds of Saddles, Stirrups and Levers.

**WRITE FOR SAMPLE**

### Technical Service to Knitters.

Through an arrangement with the American Laundry Machine Company, Cincinnati, O., the National Association of Hosiery and Underwear Manufacturers is enabled to offer to its members a rather unique service—technical consultation at the mill with regard to machinery troubles.

Although this form of service has been in operation for sometime as a part of the machine company's specialty department, it is only recently that it has been extended to members of the hosiery association.

Briefly, the service consists of technical advice to manufacturers of hosiery and underwear with regard to their finishing machinery troubles. The American company maintains a staff of highly trained men capable of analyzing knitting mill finishing problems pertaining to hosiery dyeing and finishing, underwear finishing and treating, shrinking and setting the cloth prior to the cutting operation. Through arrangement with the association these men will call on any member mill anywhere to work out with the management the selection of proper machinery, layout of hosiery dye houses and finishing departments for knit goods, and also solve problems pertaining to hydro extracting and centrifugal work.

The National Association is handling the correspondence between members and the machine company entailed by this service, which is being conducted entirely without obligation to members of the association.

### H. A. Metz & Co., Inc., Originates Acid Wool Dye.

Most, if not all, of the dyestuffs produced in the United States are duplications of products which have been known for a shorter or longer time.

It is of interest to the trade in general, therefore, to know that an entirely new wool dyestuff of great merit has been introduced by H. A. Metz & Co., Inc.

The new shade is known as Brilliant Acid Blue 3B.

It is an acid wool dyestuff of great strength, producing brilliant blue shades of satisfactory fastness to washing, wearing, and does not crock. It dyes level and can be used in combination with other acid dyestuffs. It may be used advantageously wherever a blue of great brilliance and strength at a reasonable price is desired.

### Jennings Cotton Mill.
### Lumberton, N. C.

16,876 spinning spindles.

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| B. L. Dalny | Supt. |
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| W. F. McDonald | Second Hand No. 1 Spinning |
| Elax McDuffie | Second Hand No. 2 Spinning |
| Clayton Singleton | Master Mechanic |
| W. B. Parnell | Night Carder |
| R. L. Deaton | Shipping Clerk and Outside Foreman. |

**In Market for Looper Clips.**
We use large quantities of soft, white looper clips in manufacture of our floor mops and will contract for your entire year's output.
**The Justice-Brown Co.**

**Do You Need This Man?**
**Greensboro, N. C.**
Experienced superintendent with several years on both plain and fancy work. Good manager, excellent references. Can positively get results. Address Results, care Southern Textile Bulletin.

**For Quick Sale, I Offer At Exceptionally Low Prices:**
1 40" Saco-Pettee Breaker.
2 Saco-Pettee Intermediates.
2 Saco-Pettee Finishers.
1 60-Spindle 12 x 6 Saco-Pettee Slubber.
4 128-Spindle 8 x 4 Saco-Pettee Speeders.
4 Whitin Spinning Frames, Medium Gravity Spindles.
1 60-Spindle 4 x 6 Whitin Spooler.
3 2½" Ring, 7" Traverse Draper Twisters.
8 4½" Verticle Ring, 7½" Travis, tape drive Saco-Lowell Twisters.
3 Lindsay Hyde Reels,
2 Lowell Section Warpers, with balling attachment.
Also have a large lot of 7", 9", and 11" Card Room Bobbins and Swekers for same and large lot of Draper and Whitin Spinning Bobbins. Have a few thousand 4 x 6 and 5 x 6 Spools.
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SPINNING RING SPECIALISTS
FOR MORE THAN FIFTY YEARS
SPINNING RINGS
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DIAMOND FINISH
TRAVELLER CLEANERS
TRAVELLER CUPS
GUIDE WIRE SETS
WHITINSVILLE SPINNING RING CO.
WHITINSVILLE, MASS.

### How to Obtain the Loom Particulars From a Small Sample of the Finished Cloth.

(Continued from Page 12)

weave employed. It has been known that ordinary structures take-up about an equal amount of warp and filling, whereas in warp ribbed cloths the filling is straight, and in consequent more warp is taken up. In the case of filling ribbed structures the warp being almost straight, the yield of cloth will be almost the cloth length. In addition to the above factors, it should be observed that, during the process of weaving, the dimensions of cloths, identical in make or structure, may vary to some extent, owing to the fact that the tensioning of the warp beam will influence the take-up in some slight degree. The length of grey cloth obtainable from a given length of cloth can only be estimated owing to the innumerable variations which obtain in the making of woven fabrics. To make fairly accurate estimates the application of an extensive knowledge of weaving cloths is essential; or it is possible to some extent to estimate this result by resorting to records of length of similarly constructed cloths.

In reproducing any woven fabric it is necessary to give special consideration to the edges or selvage. The body of a cloth may be perfect in structure and design, but if the edges are not even, level and regular, the cloth may be banned as unsalable. The appearance of the selvage in all cases gives improved character to the piece.

### The Week's Cotton Trade.

Cotton prices during the week ending February 1 moved with a narrow range compared with the fluctuations the previous weeks. March future contracts on the New York Cotton Exchange advanced about ½ cent per pound and the average of the quotations for No. 5 or middling cotton in ten designated spot markets advanced about a like amount. March future contracts on the New York Cotton Exchange closed at 33.62 cents, compared with 33.13 cents at the close of the previous week, and the average of the quotations for No. 5 in ten designated spot markets closed at 33.61 cents per pound as compared with 33.16 cents last week.

There was no particular outstanding feature excepting possibly the full export figure for the week which now makes the total exports as far this season about 575,000 bales above the figures for the corresponding period last season. Trade conditions in textiles were looked upon as a little more optimistic both in America and Europe. It is now quite evident that both consumption by American mills and exports will have to fall off considerably for the remainder of the six months, January to July, in order to make supplies fit the situation.

Exports for the week amounted to 146,536 bales, compared with 71,967 bales during the previous week and 132,322 bales for the corresponding week in 1923. Exports from August 1 to February 1 amounted to 3,946,708 bales, compared with 3,342,207 bales for the corresponding period last season. Figures include exports to Canada to December 31.

Certificated stock at New York on February 1 was 153,926 bales. Total stocks, all kinds, at New York were 165,814 bales.

New York future contracts closed February 1: March, 33.62 cents; May, 33.91; July, 32.58; October, 28.05; December, 27.50. New Orleans closed: March, 33.62 cents; May, 33.35; July, 32.46; October, 32.27; December, 32.54. New Orleans spot cotton, 33.63 cents per pound.

### Cotton Movement From August 1, 1923, to February 1, 1924.

| | 1924 Bales | 1923 Bales |
|---|---|---|
| Port receipts | 5,336,323 | 4,510,748 |
| Port stocks | 874,216 | 913,015 |
| Interior receipts | 6,258,788 | 6,184,116 |
| Interior stocks | 944,868 | 1,150,906 |
| Into sight | 9,174,710 | 8,825,297 |
| Northern spinners' takings | 1,264,373 | 1,536,653 |
| Southern spinners' takings | 2,750,300 | 3,066,027 |
| World's visible supply of American cotton | 3,030,084 | 3,359,121 |

### Textile Exposition To Be Held at Dresden.

It has been announced that the Third Annual Exhibition to be held at Dresden in the summer of 1924 will be devoted to textiles. It is probable that this exhibition, which is to be held as usual in the Dresden Exhibition Hall, will be limited principally to the Saxon textile industry. It is stated that some of the special features will be an exposition of the economic value of the industry and an outline of its historical and scientific sides, says Consul Louis G. Dreyfus, Jr., of the State Department, in a report from Dresden.

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**Cotton Merchants**
Direct Mill Correspondence Solicited
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**WATSON-WHITE COMPANY**
(Incorporated)
**Cotton**
**Offices:**
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We gin over 15,000 bales of cotton annually, and would ship from gin to mills on type.
**Jackson, Tennessee**

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*D. W. BROOKS, Vice-President*
*W. H. WILLEY, Vice-President*
*NORMAN MONAGHAN, Secy-Treas.*

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*Mississippi Delta Cotton our Specialty*

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**RIVERS, BENDERS and STAPLE COTTON**
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CABLE ADDRESS BIGBOY **DOMESTIC**
ALABAMA, GEORGIA DELTA AND WESTERN COTTONS
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Buying agencies in the best staple sections in Arkansas, Oklahoma, Texas, Mississippi, Tennessee, Alabama and Georgia. All shipments given careful attention.

Direct selling agency for North and South Carolina and Virginia.

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**P. E. HENSON & CO.**
Cotton
All Grades and Staples
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A. L. Betts A. M. Williams
**HOPE COTTON CO.**
Incorporated
Arkansas Cottons
All Grades and Staples
35 Years in the Cotton Business
Hope, Arkansas

**W. F. EVANS & CO.**
Cotton
In the Heart of the Delta
Mississippi and Arkansas Rivers,
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**Anderson Cotton Co.**
Cotton Merchants
Delta Character Cotton
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**C. H. Crutchfield & Co.**
Established 1909
Benders and Extra Staples
Hope, Arkansas

**S. C. Alexander & Co.**
Established 1886
Heavy Bodied Arkansas Cotton
Pine Bluff, Ark.

**The Jefferson-Lincoln Cotton Growers Assn.**
An organization of farmers who wish to sell direct to mills.
Pine Bluff, Ark.

**JETT WILLIAMS & CO.**
Cotton
Jett Williams A. S. Williams
All Grades and Staples
Hope, Arkansas

**ARKANSAS COTTON GROWERS' COOPERATIVE ASSOCIATION**
Main Office, Little Rock, Arkansas
Shippers of All Kinds of Arkansas, Tennessee and Missouri Cotton
F. L. PAGE, Gen. Mgr. Cotton Department

**EMMONS LOOM HARNESS COMPANY**
The Largest Manufacturers of Loom Harness and Reeds in America
Loom Harness and Reeds
Slasher and Striking Combs, Warps and Leice Reeds, Beamer and Dresser Hecks, Mending Eyes, Jacquard Heddles
LAWRENCE, MASS.

**Bobbins, Spools, Skewers, Shuttles**
We represent first-class manufacturers on SHUTTLES, BOBBINS, SPOOLS, SKEWERS, SCAVENGER ROLLS and TOP FLATS, and have attractive prices.
**Carolina Specialty Company**
**Agents in the Carolinas**
**Charlotte, N. C.**

## Visiting the Textile Machinery Shops.

(Continued from Page 11)

to help carry on the business of his father.

David Brown, the founder of the business, died last year and will be greatly missed. He was a man who did business upon a clean, straight basis and left a splendid name behind him. I met him in the South more than twenty years ago and I always enjoyed my visits to him.

His sons are live, energetic young men with the same high business ideals as their father.

They recently bought the Lowell Bobbin Company, of Newport, Vt., and J. A. Aubin came to them from that plant as superintendent of the David Brown Company. He is rated as one of the best bobbin manufacturers in the country.

George Gibson Brown showed me over their plant and I was amazed at its magnitude and efficiency.

At every point were the latest automatic machines. A blank would be put in a lathe, two levers pulled for the purpose of bringing forward certain knives and almost before I could look a fully shaped bobbin was being taken from the lathe.

The bobbins are placed in a revolving chuck and are bored three times as they pass forward.

As the bobbins pass forward through the processes, many are by reason of defects dropped into waste bins and expensive wood goes to feed the boilers.

When I saw how many blanks had to be started in order to get a relatively small number of perfect bobbins, I no longer wondered at the cost of bobbins and spools.

Their spool department was handled on similar efficient lines and also the shuttle department, which is in charge of H. L. Bonney, who was with Mr. David Brown for thirty-eight years and knows all there is to know about shuttles.

I had always looked upon dry kilns as small outhouses but at the David Brown Company the dry kilns are arranged, on both floors, of a modern reinforced concrete building with bins built of hollow tile and fitted with steam coils.

In spite of that system it is their rule that a shuttle block must, after being dried, remain stored for two years before being made into a shuttle.

To give an idea of the magnitude of this business, I cite the fact that when I was at the plant the David Brown Company had stored 400,000 shuttle blocks, 8,000,000 bobbin blanks, and 1,000,000 speeder bobbin blanks.

Very few cotton mills carry as much insurance as they do.

In order to be able to give their customers quick service the David Brown Company partially process and store a large number of spool heads and bobbin blanks and can therefore complete rush jobs very quickly.

**COBB COTTON CO.**
Cotton
Mississippi Delta Staple
Our Specialty
Helena, Ark.

Returning to the office, I received a phone message from Irving Southworth, agent of the Pacific Mills at Lawrence, but formerly agent at Columbia, S. C. Irving had found out somehow that I was in Lawrence and wanted me to meet him at the Rotary Club luncheon.

As George Brown was also a Rotarian, I went with him and sat between George and Irving during the lunch. Across the table was Mr. Twiss, agent of the Everett Mills, whom I had met several times in the past.

Very unexpectedly, Harry Lauder, the Scotch comedian, himself a Rotarian, showed up at the meeting and made a wonderful talk on European conditions.

I returned to Boston on the 3:10 p. m. train, having learned much in the plants I had visited.

(Continued Next Week)

## TRADE NOTES ON KNIT GOODS.

### Ireland.

There seems to be a good opportunity for the introduction of certain grades of American hosiery for men and women, if prices are low enough to compete with British prices. The principal demand at present is for cotton, lisle and artificial silk hosiery both for men and women. Since a comparatively large percentage of the people belong to the laboring and low salaried classes the demand for cheap hosiery is correspondingly great. Up to the present time the bulk of the lisle and imitation silk hosiery imported has come from Great Britain, due to the proximity of Dublin to the British hosiery and manufacturing centers, to the relatively low prices of British hosiery, and to the fact that English manufacturers have seriously cultivated the market. The price, however, is the most important consideration, and if American exporters can compete in this respect they should find a good outlet for their product provided effective marketing methods are used. Prices of men's cotton lisle hose vary from 20 to 50 cents per pair, and women's cotton hose from 40 to 75 cents per pair. Men's artificial silk hose retail at 44 to 75 cents per pair and the same goods in women's style are offered at from 50 cents to $1 per pair. The demand for high priced silk hosiery is not nearly so good as in the United States, for the damp and cold climate favors the sale of heavy wearing apparel. It would be practically impossible for American manufacturers of wool hosiery to compete in this market.—Consul Charles M. Hathaway, Dublin, December 21, 1923.

### Belgium.

Before the war there was a good market here for ladies' foreign-made hosiery, and one American firm sold approximately 200,000 dozen pairs annually. The present low exchange rate of the Belgian franc, however, has seriously injured this trade, so much so that there are now comparatively few imports of hosiery from the United States. Pure silk hosiery has only a light demand in Antwerp. The damp, rainy climate which prevails for nearly 10 months of the year favors the sale of heavier wearing apparel. Pure silk stockings are considered a luxury by many Belgians, as the price ranges between 720 and 900 francs per dozen. (The current value of the franc equals approximately $0.046). The demand for hosiery of silk and fiber mixture is constantly increasing and is considerably greater than that for pure silk stockings. Germany and France are the principal suppliers of the foreign hosiery sold in Belgium. The import duty on silk and fiber hosiery is 20 per cent ad valorem.—Consul George S. Messermith, Antwerp, December 22, 1923.

### Turkey.

It is estimated that imports of both pure and artificial silk women's stockings for the year 1913 will amount to $82,500. The principal countries of origin at the present time are Germany, France and Italy. Germany, having been much more successful than the other competitors, provide about 80 per cent of the imports of this class of goods. The best silk stockings usually come from Troyes or other centers in France. There are almost no American silk stockings on this market except for old stocks. From 1919 to 1922 American firms were able to compete successfully, but have now been practically eliminated from the market. This has been due to the depreciation of both Turkish and German currency in comparison with the American dollar, and to the intensive methods used by the Germans in cultivating the market and the liberal credit facilities offered by them. — Vice Consul Herbert S. Bursley, Constantinople, December 5, 1923.

### Nicaragua.

The domestic demand for silk hose is very small and merchants as a rule only order a few dozen pairs at a time. Hosiery costing $24 per dozen pair wholesale must be retailed at $4 per pair in order to realize from 20 to 25 per cent profit. This is partly due to the fact that such goods move so slowly that before they are all sold some of them have deteriorated. It is generally known that silk hose packed away deteriorates very rapidly in the tropics.—Consul William W. Heard, Bluefields, December 27, 1923.

### Brazil.

The local market for imported hosiery is small due to the fact that a thriving domestic hosiery industry operating within a very high tariff wall, supplies the bulk of the demand. At the present time two grades of hosiery are being imported to a limited extent: First, expensive silk hosiery, better than the domestic product; and second, well-made, cheap cotton hosiery. In 1922 Germany, France and the United States, in the order named, supplied the bulk of the cotton hosiery imported, the total imports of which, however, amounted only to $35,881, as compared with $357,694 in 1913.—(Consul General A. Gaulin, Rio de Janeiro, December 18, 1923.

### United States.

We wish to call the especial attention of knit goods exporters to an article by A. J. Wolfe, chief, Division of Commercial Laws, on foreign agency agreements which appeared in the January 21 issue of "Commerce Reports," page 152. This article presents in a very able manner the numerous factors which enter into the solution of the problem of foreign agency agreements. Interested firms who are not subscribers to "Commerce Reports" may obtain copies of this article by addressing the Textile Division, Bureau of Foreign and Domestic Commerce.

### England.

The new knitted cloth which so closely resembles the woven fabric now being manufactured in Nottingham has not thus far been a commercial success, as it has not been possible to eliminate entirely the tendency to sag or stretch, and since only the best quality of wool can be used, it is claimed that it is practically impossible to produce an article which can be sold at a competitive price.—Consul Samuel T. Lee, Nottingham, November 26, 1923.

### Bahamas.

In 1921 the United States supplied all the cotton hosiery imported into the Bahamas in spite of the fact that there is a 25 per cent duty preference in favor of British-made goods. Imports of cotton hosiery, however, during that year amounted to only $7,391.—Consul L. A. Lathrop, Nassau, December 5, 1923.

## The World Cotton Situation.

The Department of Commerce has now completed through its domestic and foreign staff, in co-operation with the Department of Agriculture, a preliminary world raw cotton survey for the four months ending November 30, 1923. The estimates are based upon information obtained from the representatives of this department and from consular officers abroad, from official reports, and from reliable trade sources.

Estimated world's supply and distribution of cotton, four months ending November 30, 1923. (Bales of 478 pounds net.)

| | American Bales | All Kinds, Including American Bales |
|---|---|---|
| Stocks July 31, 1923 | 3,065,000 | 6,341,000 |
| Production for commercial use for the 1923-24 season (1) | 10,081,000 | 18,075,000 |
| Total supply | 13,146,000 | 24,416,000 |
| Consumption during the four months ending Nov. 30, 1923 | 3,710,000 | 6,310,000 |
| Supply on Nov. 30, 1923 (2) | 9,415,000 | 18,185,000 |

(1) The production figures represent estimated total crops, with the exception of India and China, where only the cotton produced for mill consumption and export is considered, cotton used in household consumption not being included.

(2) The estimated supply on November 30 was arrived at by compilation and includes stocks in mill, ports and warehouses; also cotton estimated to be elsewhere. The latter quantity was obtained by deducting the cotton accounted for up to November 30 from the estimated crops.

If the supply on November 30 is obtained by subtracting the consumption from the total supply the resulting figures will differ somewhat from those given here because it is not possible to get a complete balance on account of insufficient data.

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# Cotton Goods

New York.—The primary cotton goods markets were very quiet during the week. Prices remained practically unchanged on finished goods, but some easing was noted in the gray goods division. Sales were small and confined almost entirely to small lots for prompt shipment. There was some improvement in the demand for flannels and fall business is reported as more encouraging. Some of the largest flannel mills have closed up their lines and withdrawn from the market.

Sales of ginghams, percales and bleached cottons were small. Domestics were quiet, with both wholesalers and retailers showing interest only in their nearby requirements.

The demand for finished goods was somewhat better than for the unfinished lines. Prices were steadier because many lines are not priced in keeping with the higher cotton levels. Sales of fancy goods, novelty bed spreads and draperies were fairly large during the past week.

Print cloth and sheetings markets were quiet, showing only widely scattered sales of small quantities.

Print cloths sold for February, March and April delivery in one case at 9⅞ cents for 38½-inch 64x60s, but most trades wanted from ⅛ to ¼ cent more for any contracts. Sales of spots were made from second hands at 9¾ cents. Sales of 44-inch 6.40s were made at 9 cents. Narrow cloths are now offered from mills on a basis of 7¼ cents for 27-inch 64x60s, although all mills will not accept that basis.

Little or no change of moment was reported in convertibles. It is possible to buy odd lots of sateens, twills and other goods at concessions of ¼ cent from many quoted prices on firm bids and usually from second hands. It was also reported that some mills are open to accept bids at lower figures from desirable customers.

There has been some easing in silk and cotton goods. in the spot markets. Combed goods are generally very quiet.

Reports of some business in fancy combed goods continue to be heard in different quarters in varying quantity. There have been reports of some box loom work with art silk cotton among sample pieces for next year.

For 40-inch 96x100, 7.00 yard, combed lawns, spots, 19 cents had been paid. For 35-inch 96x64 single end Canton, 22 cents paid, and 29 cents paid for some 80x56 Tussah spots.

Army duck sales have been made at 29½ cents, 8-ounce card basis. Enameling ducks are now available at 54 cents for narrow widths in heavy weights from first hands. Second hands will shade some odds and ends further. Wide drills and twills are a little easier at 53 cents to 60 cents. Producers are quoting hose and belting duck from 52 cents to 55 cents, though a few lots were sold for 50 cents, presumably odds and ends. A moderate business continues to be done.

Cotton goods prices were quoted as follows:

Print cloths, 28-inch 64x64s, 7⅞ cents; 64x60s, 7⅝ cents; 38½-inch 64x64s, 10 cents; brown sheetings, Southern standards, 17 cents; denims, 220s, 26 cents; tickings, 8-ounce, 30 cents; staple ginghams, 13½ cents; prints, 10¾ cents; dress ginghams, 21½ cents to 24 cents, nominal.

## January Prices of Grey Cloth Lower in Manchester and New York Than December.

A slight recession from the high price level of 1923 registered the week ending December 8 for both Manchester and New York, is evident in the January prices for these markets. The weekly average of the three sheetings and five print cloths with an average construction of 61x60, in the New York market opened in 1924 at $0.5747 per pound declining to $0.5536 on January 23. Prices of Manchester and Japanese cloths were also lower than in December.

Recent reports are incomplete for the Indian market. But it is desired to call attention to the resumption of Chinese price quotations. Assistant Trade Commissioner Howard, of Shanghai, writes: "We believe that auction prices which we are at present quoting on six grey shirtings, afford a very reliable basis for imported cloths, as auction prices do not depend upon the price which the auction house would like to receive, but reflect the market value of these cloths to the Chinese buyers. Certain shops are known as auction shops and these are offered and sold irrespective of loss or gain to the auction houses and their shippers in England." It might also be mentioned that the Textile Division hopes to quote prices on native Chinese cloths within the near future.

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# The Yarn Market

Philadelphia, Pa.—There was little change in the yarn market last week. Business continued very slow, with inquiry small and sales light. Hand-to-mouth buying, at low prices, constituted the bulk of the business. Prices were very irregular, showing a wide difference between quotations for spot lots in dealers' hands here and prices quoted by the spinners. The uncertainty of raw cotton prices continued to keep both buyers and sellers uneasy over the situation.

Spinners and commission houses who had hoped for an improved market in January were generally disappointed. Spinners found no better conditions as the market ended, the market having been controlled during January entirely by the buyers. Prices in this market on many yarn counts dropped to a level with 30-cent cotton during the month, but cheaper prices proved no inducement to buyers. Future business was very small, buying showing no interest in covering their requirements for the coming months. As a rule the spinners continued very firm in their price ideas, and price competition was confined almost entirely to resellers who cut prices to very low figures. Some counts of carded skeins dropped as much as four cents during the month. The greater part of the yarns sold went to the weaving trades, knitters buying only very small quantities of yarns.

Combed yarns moved slowly during the month. Prices on mercerized yarns held up better than those on yarns in the gray, although mercerizers state that the prices they were able to get did not show them a margin of profit.

Yarn prices in this market were published as follows:

**Two-Ply Chain Warps.**

| | | |
|---|---|---|
| 2-ply 8s | 46 | a__ |
| 10s | 47 | a__ |
| 12s to 14s | 48 | a49 |
| 2-ply 16s | 50 | a__ |
| 2-ply 20s | 51 | a51½ |
| 2-ply 24s | 54½ | a55 |
| 2-ply 26s | 55 | a56 |
| 2-ply 30s | 56½ | a57 |
| 2-ply 40s | 66 | a68 |
| 2-ply 50s | 76 | a__ |

**Two-Ply Skeins.**

| | | |
|---|---|---|
| 8s | 44½ | a45½ |
| 10s to 12s | 46 | a47 |
| 14s | 48½ | a49 |
| 16s | 49½ | a50 |
| 20s | 50 | a51 |
| 24s | 54 | a54½ |
| 26s | 54½ | a55 |
| 30s | 56 | a57 |
| 36s | 63½ | a__ |
| 40s | 65½ | a__ |
| 40s ex. | 72 | a73 |
| 50s | 75 | a76 |
| 60s | 81 | a__ |
| Tinged Carpet—<br>3 and 4-ply | 42 | a43 |
| White Carpet—<br>3 and 4-ply | 44½ | a45 |

**Duck Yarns.**

| | | |
|---|---|---|
| 3, 4 and 5-ply— | | |
| 8s | 45 | a__ |
| 10s | 46 | a47 |
| 12s | 46½ | a48 |
| 16s | 49½ | a50 |
| 20s | 50 | a51 |

**Single Chain Warps.**

| | | |
|---|---|---|
| 10s | 46½ | a__ |
| 12s | 47½ | a__ |
| 14s | 47½ | a__ |
| 14s | 48½ | a__ |
| 16s | 49½ | a50 |
| 20s | 50½ | a__ |
| 24s | 53½ | a54 |
| 26s | 54½ | a55 |
| 30s | 57 | a58 |
| 40s | 69 | a__ |

**Single Skeins.**

| | | |
|---|---|---|
| 6s to 8s | 45½ | a__ |
| 10s | 46½ | a__ |
| 12s | 47½ | a__ |
| 14s | 48 | a__ |
| 16s | 48½ | a49½ |
| 20s | 59½ | a__ |
| 24s | 54 | a__ |
| 26s | 54½ | a__ |
| 30s | 57 | a__ |

**Frame Cones.**

| | | |
|---|---|---|
| 8s | 46 | a__ |
| 10s | 46 | a__ |
| 12s | 47 | a__ |
| 14s | 47½ | a__ |
| 16s | 48 | a__ |
| 18s | 50 | a__ |
| 20s | 51 | a__ |
| 22s | 51 | a__ |
| 22s | 51 | a__ |
| 24s | 53½ | a__ |
| 26s | 54 | a__ |
| 28s | 55 | a__ |
| 30s | 55 | a__ |
| 30s bdls ord. | 59 | a__ |
| 30s tying in | 57 | a__ |
| 40s | 66 | a68 |

**Combed Peeler Skeins.**

| | | |
|---|---|---|
| 2-ply 10s | 65 | a__ |
| 2-ply 20s | 68 | a70 |
| 2-ply 30s | 73 | a75 |
| 2-ply 36s | 78 | a80 |
| 2-ply 40s | 80 | a82 |
| 2-ply 50s | 90 | a93 |
| 2-ply 60s | 95 | a1 00 |
| 2-ply 70s | 1 05 | a1 10 |
| 2-ply 80s | 1 20 | a1 25 |
| 10s | 57 | a58 |

**Combed Peeler Cones.**

| | | |
|---|---|---|
| 12s | 58 | a59 |
| 14s | 59 | a60 |
| 16s | 60 | a61 |
| 18s | 61 | a62 |
| 20s | 62 | a62½ |
| 22s | 63 | a63½ |
| 24s | 63½ | a64 |
| 26s | 64½ | a65 |
| 28s | 65 | a66 |
| 30s | 66 | a68 |
| 32s | 71 | a73 |
| 34s | 73 | a75 |
| 36s | 78 | a80 |
| 38s | 79 | a81 |
| 40s | 80 | a82 |
| 50s | 85 | a90 |
| 60s | 95 | a1 00 |
| 70s | 1 10 | a1 15 |
| 80s | 1 25 | a1 20 |

**Carded Peeler Thread Twist Skeins.**

| | | |
|---|---|---|
| 20s, 2-ply | 61 | a__ |
| 22s, 2-ply | 62 | a__ |
| 24s, 2-ply | 63 | a__ |
| 30s, 2-ply | 66 | a__ |
| 36s, 2-ply | 70 | a__ |
| 40s, 2-ply | [illegible] | a__ |
| 45s, 2-ply | 79 | a__ |
| 50s, 2-ply | 88 | a__ |

**Carded Cones.**

| | | |
|---|---|---|
| 10s | 52 | a__ |
| 12s | 53 | a__ |
| 14s | 54 | a__ |
| 20s | 55 | a56 |
| 22s | 56 | a58 |
| 26s | 60 | a61 |
| 28s | 62 | a63 |
| 30s | 63 | a65 |

### Polish Market Stagnant.

The comparative stabilization of the mark has again checked all activity in the textile market in Poland. The trend of the market is decidedly pessimistic. In the wholesale cotton goods trade transactions are limited to those cases where goods are disposed of with a view to securing funds required to meet payment of notes. Most transactions are for United States currency at 40 per cent below the current price list, Consul General L. J. Keene, of the State Department, reports from Warsaw.

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WANT position as overseer spinning. Age 37, 12 years as overseer. First class references. Address No. 3808.

WANT position as superintendent, or overseer large card or spinning room. High class man, experienced and practical, references to show good past record. Address No. 3809.

WANT position as superintendent of large yarn mill. Have been overseer and superintendent in some of best yarn mills in North Carolina. Have fine record as to quality and quantity at low cost. Address No. 3810.

WANT position as carder or spinner or both. Capable of handling large room in first class man. Long experience, fine references. Address No. 3811.

WANT position as carder or spinner. Experineced mill man, now running card room at night but want day job. Good references as to character and ability. Address No. 3812.

WANT position as superintendent. Practical man of long experience and ability to get good results. Now employed as superintendent. Good references. Address No. 3813.

WANT position as master mechanic. Have had 24 years experience in cotton mill shops both steam and electric drive. References. Address No. 3813-A.

WANT position as overseer weaving on Draper looms, plain white goods preferred. Now employed, but desire better job. Good references from good mill men as to character and ability. Address No. 3815.

WANT position as overseer carding. Good man, now employed, but wish better position. First class references showing good past record. Address No. 3816.

WANT position as superintendent of yarn or weave mill. Long experience in carding, spinning and weaving, and winding. Can get quantity and quality production at lowest cost. Age 39, good character and references. Address No. 3817.

WANT position as superintendent. Practical manufacturer of ability and experience. Good manager of help. Fine references. Address No. 3818.

WANT position as overseer weaving. First cuass weaver in every respect, sober, reliable and hard worker. Experienced on wide variety of goods. Good references. Address No. 3819.

WANT position as superintendent or manager of yarn or cloth mill in the Carolinas. Now general superintendent of large mill, have held job satisfactorily for three years but have good reasons for wanting to change. Good references. Address No. 3821.

WANT position as superintendent, overseer carding or assistant superintendent on yarn or plain cloth mill. High class, reliable man, good manager of help. A-1 references. Address No. 3822.

WANT position as overseer weaving. Strictly high class man of good character; long experience in weaving, best of references. Address No. 3823.

WANT position as superintendent, or carder or spinner. Now employed as spinner in mill on fine yarns and am giving entire satisfaction. but want larger place. Good references. Address No. 3824.

WANT position as superintendent, carder or spinner. Practical man of long experience in good mills. Fine references. Address No. 3825.

WANT position as master mechanic. Now employed, but want larger job. Many years experience as mechanic, steam and electric drive. Excellent references. Address No. 3826.

WANT position as superintendent or traveling salesman. Experienced mill man and can give excellent references. Address No. 3827.

WANT position as superintendent. Have held position as such in some of the best mills in South and give satisfactory references to any mill needing first class man. Address No. 3827.

WANT position as master mechanic. Long experience in mill machine shop, fully competent to handle large job. Fine references. Address No. 3829.

WANT position as overseer carding or spinning, or superintendent. Practical man who has had many years experience as superintendent and overseer and can get satisfactory results. Best of references. Address No. 3821.

WANT position as superintendent of yarn mill or carder or spinner. Thoroughly familiar with these departments and am well qualified to handle either a room or a mill. Good references as to character and ability. Address No. 3832.

WANT position as superintendent of mill in North Carolina making yarns or print cloths. Now employed as superintendent of 27,000 spindle mill making 30s hosiery yarn and 64x60s print cloth. Am giving satisfaction but have good reason for making change. Best of references. Address No. 3833.

WANT position as superintendent or overseer carding. Long experience as both and can get good production at low cost. Would like to correspond with mill needing high class man. Address No. 3834.

WANT position as overseer of carding. Good worker of long experience in number of good mills. First class references to show past record. Address No. 3835.

WANT position as superintendent or overseer carding and spinning. Now employed, but wish larger place. Competent, reliable man who can give satisfaction in every way. Good references. Address No. 3836.

WANT position as superintendent or manager. Have had long experience as superintendent and am high class man in every respect. Can handle mill on any class of goods made in South. Want to correspond with mill needing high class executive. Excellent references from reliable mill men. Address No. 3837.

WANT position as overseer weaving. Practical weaver who can get big production at the right cost. Fine references. Address No. 3838.

WANT position as overseer weaving. Can handle any fabric made in South. Have had over 27 years experience from loom fixer to overseer weaving and was promoted steadily by one of largest mills in the South. Married, have family, religious worker, good manager of help. Can give excellent list of references. Address No. 3839.

WANT position as superintendent, prefer South Carolina or Georgia. Now employed as assistant superintendent and weaver and am giving entire satisfaction. Have good reasons for wishing to change. Excellent references. Address No. 3840.

WANT position as overseer weaving, prefer job of fancies. Have been weaver for past 10 years with one of the finest mills in the South. Excellent references to show a fine record. Address No. 3841.

WANT position as superintendent, yarn mill preferred. High class man who is well trained and has had long experience. Best of references. Address No 3842.

WANT position as superintendent. Now employed as such, but want better job. Good weaver as well as superintendent and get operate weave mill on very satisfactory basis. Address No. 3843.

WANT position as superintendent, carder or spinner. Now employed as superintendent. Long experience as both overseer and superintendent and can get satisfactory results. Address No. 3844

WANT position as overseer carding. Have had long experience and can furnish best of references from past and present employers. Address No. 3852.

WANT position as overseer weaving. Experienced in wide variety of fabrics and can give satisfaction. Now employed. Best of references. Address No. 3853.

WANT position as dyrer, 12 years experience on long and short chain work, raw stock, beam and Franklin machines. Can handle any size jobs on cotton. Good references and can come on short notice. Address No. 3854.

WANT position as overseer carding. Experienced an dreliable man who can handle your room on efficient and satisfactory basis. Good references. Address No. 3855.

WANT position as superintendent of medium sized mill or weaver in large mill, white or colored goods; 20 years as overseer weaving, slashing and beaming in number of South's best mills. Have held present place for nine years and am giving entire satisfaction. Address No. 3856.

WANT position as superintendent of plain or fancy goods mill, would consider offer of medium size mill at reasonable salary. Thoroughly conversant with all departments. Address No. 3857.

WANT position as superintendent of yarn or cloth mill, ginghams preferred; age 40, have family; 22 years experience, 8 years as carder and spinner and assistant superintendent; have held last position as superintendent for 7 1-2 years. N. . mill preferred. Good references. Address No. 3858.

WANT position as overseer weaving or superintendent. Long experience in good mills and can get good results. Best of references. Address No. 3859.

WANT position as overseer carding; age 33, married, 14 years in carding; 5 years as overseer. Now employed but have good reasons for wishing to change. Address No. 3860.

WANT position as superintendent of weaving mill, or would take overseer weaving in large mill on plain or fancy goods. Now employed in good plant and can give good references. Fine record in good mills. Address No. 3861.

WANT position as overseer spinning, 17 years in spinning room, now employed as second hand in 35,000 spindle room; age 28, married, sober, reliable and church member. Good references. Address No. 3862.

WANT position as overseer spinning, spooling or twisting. Age 29, married, 10 years on spinning. Can furnish good reference. Address No. 3863.

WANT position as carder or spinner, or both. Age 35, married, practical carder and spinner and can furnish fine references as to character and ability. Address No. 3864.

WANT position as overseer spinning, or carding and spinning, can give good references as to character and ability, strictly sober now employed but have good reasons for wishing to change. Address No. 3866.

WANT position as overseer cloth room, experienced on drills and sheetings; also colored goods. Can give A1 references. Address No. 3867.

WANT position as carder or spinner, or both. Experienced and reliable man, who can produce good results. Good references. Address No. 3868.

WANT position as superintendent, now employed as such, but wish to change; 4 years in present place, 8 years as carder and spinner or both warp and hosiery yarns, 5 years as spinner, been in mill over 25 years, thoroughly understand all processes from picker room to winding and twisting. Good knowledge of steam and electricity. Address No. 3869.

WANT position as overseer spinner, at $30 weekly or more, now employed in good mill, practical and experienced man. Best of references. Address No. 3870.

WANT position as superintendent or weaver; long practical experience, and can produce quality and quantity production. Address No. 3871.

WANT position as overseer weaving; 12 years on heavy duck, 14 years as overseer on sheetings, drill, osbaurgs, grain bag, tubing and rope machines; am 48. Can change on short notice. Good references. Address No. 3872

WANT position as overseer weaving, experienced on large variety of goods and can handle room on efficient basis. Address No. 3873.

WANT position as superintendent of small mill, or weaver in large plant; now employed as overseer slashing, warping and drawing-in on 360 Draper looms. Good references. Address No. 3874.

WANT position as superintendent, yarn or weave mill. Now employed, but wish larger place Excellent past record. Good references. Address No. 3875.

WANT position as agent superintendent or manager of Southern mill on white work. Would be interested in buying stock. Can furnish best of references and can show results. Address No. 3876.

WANT position as overseer weaving, now running 800 looms and giving satisfaction; familiar with colored checks, chambrays, many other lines; age 39, married, good references. Address No. 3877

WANT position as overseer weaving; age 29, married, I. C. A. graduate, experienced on plain and fine work including all kinds of cotton towels and specialties. Good references. Address No 3879.

WANT position as superintendent; 28 years experience in mill, have held present place as superintendent for 8 years, have good reasons for wanting to change. Best of references. Address No. 3880.

WANT position as supt. of yarn mil, or carder and spinner. Now employed as carder. Can furnish good references to show my record. Address No. 3881.

WANT position as carder in large mill, or supt. of small yarn mill; 20 years as carder and spinned; mostly in carding and assistant supt. Now employed as carder and assistant supt. Good references. Address No. 3882.

WANT position as carder or spinner, or both. Practical man of long experience; have excellent references. Address No. 3882.

WANT position as supt. or weaver, long experience in good mills, excellent references to show character and ability Address No. 3883.

WANT position as supt. of spinning mill. practical experienced man of good ability and can get results. Address No. 3884.

WANT position as supt. and manager of small or medium mill, or overseer of large, good paying weave room. Excellent references. Address No. 3885.

WANT position as master mechanic; 20 years experience, now employed, good references to show excellent past record. Addrss. No. 3886.

WANT position as carder and spinner or both, or supt.; 25 years in mill, 18 as supt.; married, have family. Address No. 3887.

WANT position as spinner, white work preferred; experienced and reliable man. Can come on short notice. Best of references. Address No. 3888.

WANT position as overseer of spinning, now employed as such and giving satisfaction, but wish larger place. Married, good habits, reliable and competent. Good references. Address No. 3889.

WANT position as overseer spinning. Experienced spinner, practical and capable, good character and habits, best of references. Address No. 3890.

WANT position as supt. or would take carding or spinning. Good references to show an excellent past record and can product good results. Address No. 3891.

WANT position as carder or spinner in large mill, or supt. of small or medium size mill. Long experience in good mills; good manager of help. First class references. Address No. 3892.

WANT position as supt. of small mill, with opportunity of investing in mill and advance. Long experience as overseer, good character, inventor and owner of patent that will be of great value to mill equipped to use waste sock. Patent would give mill big advantage in manufacture of twine, rope and similar products. Would take stock for entire amount of pattern and invest small amount in addition, or would consider new mill. Address No. 3893.

WANT position as master mechanic. Long experience on both steam and electric work, 14 years in mill shops, good references. Address No. 3895.

WANT position as supt., assistant supt., carder or spinner, mule or ring frames good man of long experience best of references. Address No 3894

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  - Whitin Machine Works.
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  - Whitin Machine Works.
  - Southern Spindle & Flyer Co.
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  - ——See Heddles and Frames.
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—U—

United Chemical Products Co., Jersey City, N. J.
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Universal Winding Co., Boston, Mass.

—V—

Vermont Spool & Bobbin Co., Burlington, Vt.
Victor Ring Traveler Co., Providence, R. I.
Vogel, Joseph A. Co., Wilmington, Del.

—W—

Wadsworth, Howland & Co., Boston, Mass.
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Watson, White Co., Jackson, Tenn.
Westinghouse Electric & Mfg. Co., East Pittsburgh, Pa.
Whitin Machine Works, Whitinsville, Mass.
Whitinsville Spinning Ring Co., Whitinsville, Mass.
Williams, J. H. Co., Millsbury, Mass.
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Williams, I. B. & Son, Dover, N. H.
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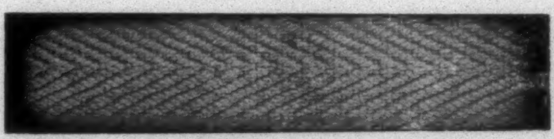

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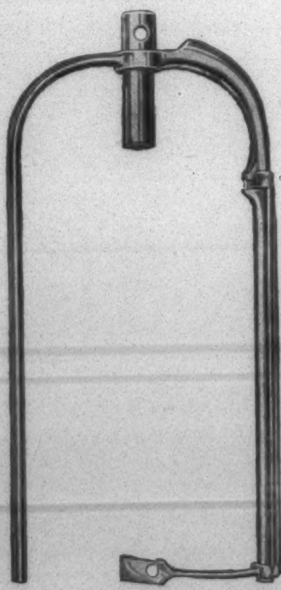

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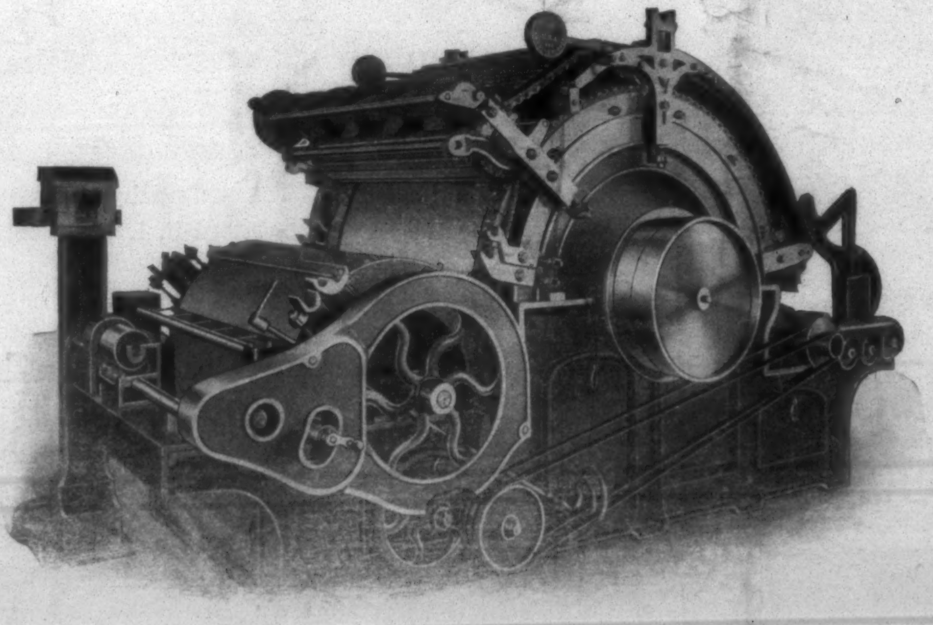

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